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ABSTRACT

One of a series of seven modules developed to improve the knowledge and skills of vocational educators who are or will become involved in the instruction of handicapped students in regular (mainstream) classes, this module is intended for inservice training of vocational educators working at the secondary level, and focuses on (1) acquainting vocational educators with the ethical and legal rights of the handicapped to vocational education services (section 1), (2) familiarizing vocational educators with particular handicapping conditions, including terminology, variations in severity, and differing capabilities of handicapped students (section 2), (3) acquainting vocational educators with the components (planning, instructional design, and evaluation) of vocational education programs for the handicapped and providing illustrations from existing mainstreaming efforts for the various handicapped categories being considered (sections 3 and 4), and (4) acquainting vocational educators with resource and referral agencies and various publications available to aid them in the instruction of handicapped students (covered in the resource section). A final assessment section provides questions to serve as a check of general understanding of instructional considerations in teaching the handicapped. (Author/HD)

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MAINSTREAMING THE HANDICAPPED IN VOCATIONAL EDUCATION

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Developing a General Understanding

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Berkeley Unified School District	Orientation Center for the Blind, Albany
Fullerton Joint Union High School District	San Diego City Regional Occupation Program
Grossmont Union High School District	San Francisco Unified School District
La Puente Valley Regional Occupational Program	San Jose Regional Vocational Center
Los Angeles City Unified School Dist.	San Jose Unified School District
Long Beach Unified School District	San Mateo County Regional Occupation Program
North Orange County Regional Occupational Program	Selaco-Downey High School, Los Angeles County
. . . . .	

The Consortium of the California State University and Colleges

STATE OF CALIFORNIA
DEPARTMENT OF EDUCATION

Vocational Education Support Unit

Statement of Understanding Between the Vocational Education Support Unit and the Special Education Support Unit

Background

The Vocational Education Act of 1968 (P.L. 90-576) has as one of its purposes the development of vocational training and retraining programs for handicapped persons.

To insure that such training is realistic with respect to the special needs of handicapped persons, the Act requires that state leadership in special education services and vocational education services enter into cooperative planning and program implementation arrangements.

Purpose

The purpose of this statement of understanding is to assure continued and augmented cooperation between the staffs of the Special Education Support Unit and the Vocational Education Support Unit of the State Department of Education in such actions as the following:

1. The joint development of provisions in the State Plan for the vocational education of handicapped persons in California
2. The joint review of those applications for funds for programs of projects providing benefits to handicapped persons.
3. The joint development of appropriate programs and project activities to meet the vocational education needs of the handicapped.
4. The joint development of appropriate inservice training of teachers for the handicapped and of vocational education teachers working with the handicapped.
5. To provide for intradepartment and interdepartment communication to facilitate program evaluation.

This statement of understanding is intended to formalize and recognize the working relationship that has long existed between these two services within the California State Department of Education.

For the Vocational Education Support Unit:

Signed: Samuel L. Barrett

State Director of
Vocational Education

For the Special Education Support Unit:

Signed: Leslie Brinegar

Manager, Special Education
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Reprinted from California State Plan for Vocational Education. California State Department of Education, 1976.

STATE OF CALIFORNIA

Statement of Understanding Between the State Board of Education, the Board of Governors of the California Community Colleges, and the Department of Rehabilitation

Background

The Vocational Education Act of 1968 (P.L. 90-576) has as one of its purposes the development of vocational training and retraining programs for handicapped persons.

To insure that such training is realistic with respect to the special needs of handicapped persons, the Act requires that state leadership in special education services and vocational education services enter into cooperative arrangements.

Purpose

The purpose of this statement of understanding is to assure continued and augmented cooperation between the Department of Rehabilitation staff, the State Board staff, and the Board of Governors staff in such actions as the following:

1. The development of provisions in the State Plan for the vocational education of handicapped persons in California.
2. The review of applications for funds for programs or projects providing benefits to handicapped persons.
3. The development of appropriate programs and project activities to meet the vocational education needs of the handicapped.
4. The development of appropriate inservice training of teachers for the handicapped.
5. To provide for interdepartment communication to facilitate program evaluation.

This statement of understanding is intended to formalize the working relationship between these state agencies.

For the Department of Education and the State Board of Education:

Signed: Wilson Riles

Superintendent of Public Instruction, Director of Education, and executive secretary, State Board of Education

For the Department of Rehabilitation:

Signed: Ray Taverne

Acting Director, Department of Rehabilitation

For the Board of Governors of the California Community Colleges:

Signed: Glen W. Brossman

Chancellor and the executive officer, Board of Governors of the California Community Colleges

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Reprinted from California State Plan for Vocational Education. California State Department of Education, 1976.

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Introduction

This is one of a series of modules developed by the American Institutes for Research to improve the knowledge and skills of vocational educators who are or will become involved in the instruction of handicapped students in regular (mainstream) classes.

This module is intended for inservice training of vocational educators working at the secondary level, and focuses on developing a general understanding of the goals, components, and approaches used in regular vocational education programs involving the handicapped.

The general purposes of this module are:

1. To acquaint vocational educators with the ethical and legal rights of the handicapped to vocational education services.
2. To familiarize vocational educators with particular handicapping conditions, including terminology, variations in severity, and differing capabilities of handicapped students.
3. To acquaint vocational educators with the components of vocational education programs for the handicapped and provide illustrations from existing mainstreaming efforts for the various handicapped categories being considered.
4. To acquaint vocational educators with resource and referral agencies and various publications available to aid them in the instruction of handicapped students.

The module is organized into three main sections which describe 1) the educator, the student and the task; 2) establishing a plan for instruction; and 3) carrying out that plan. Exercises, comments, and examples appear throughout the module to help focus attention on key ideas. Additionally, resources are suggested and a bibliography is included for further in-depth reading. Finally, a separate assessment section is included at the end of the module to check your own understanding.

Rights and Entitlements of the Handicapped

Human Rights

Let's start with a simple statement of reality. The handicapped student is entitled to a complete educational program not only in terms of the kinds of school services he or she may have access to, but also in terms of the kinds of human interaction that he/she can expect in the teaching/learning process. He/she is entitled to receive this general education in a specialized way. This does not mean that handicapped students are automatically to be separated out from the regular vocational program and given special classes. It does mean that the local educational agency is charged with the responsibility of providing educational experiences that will be to the maximum benefit of the handicapped student to be served.

Let's back up for a minute. Consider, if you will, that any individual in our society should be afforded the chance to lead a full and satisfying life, with the personal dignity that comes from

- the self-determination of a vocation or career
- the acquisition of appropriate skills and knowledge
- the opportunity for gainful employment

Vast numbers of handicapped adults have passed through their formative years without the kinds of educational and vocational experience that would prepare them for a useful place in society. Many of them have been denied entry into training opportunitites because their potential was underestimated; still others, because an instructor or counselor was doubtful that they could be successfully placed to gain work experience. Fortunately, the situation is changing, and changing rapidly.

A number of systematic efforts are being carried out to correct this inequity, including a variety of federal and state programs which place increased emphasis on the education of the handicapped and on the provision of approximate resources and support services at the school level. Certainly, no vocational educator should be indifferent to these large-

scale efforts for, as the saying goes, "If you aren't part of the solution you may be part of the problem." It is appropriate, then, to know something about how federal and state legislation can be applied to good advantage in the vocational preparation of handicapped young people. For example, it is useful to know that a portion of the vocational funds authorized at the federal level are to be spent for students with "special needs." Local and state agencies are given flexibility in determining how these monies can best be allocated and instructional programs modified to accommodate individual differences. Basically, these funds can be used to adapt ongoing vocational training, or they can be used to provide wholly separate instruction if that appears necessary. We'll talk more about these alternatives in the next section.

Can you spot a flaw in this statement?

Handicapped students should receive training that prepares them for certain preselected jobs on the basis of what handicapped persons like themselves have done before.

As you reflect on your answer, have you considered how important individual differences are in determining vocational potential?

Developing Individual Potential

Employment. There is no room for unwarranted discrimination in employment...a fact that has been mandated by equal opportunity employment legislation and has been put into practice at all levels of business and industry. Now, no one would argue that a paraplegic person should be a high-steel construction worker, a job which clearly precludes using a wheelchair; just as being a telephone operator is inappropriate for a person whose hearing problem is accompanied by severe impairment in speech processes. On the other hand, it is both impractical and undesirable to deny these and other handicapped persons the right to pursue some aspect of a career field of their choice. Thus, one would expect that the paraplegic person could make an excellent dispatcher or perform other occupational tasks associated with high-steel construction, or that the person with hearing and speech problems could schedule telephone installers or otherwise

perform valuable services for the telephone company.

Basically, then, the vocational educator should maintain an open mind about what occupational areas a handicapped person should pursue, serving mainly to (1) advise him or her about the realistic prospects and problems that are likely to be encountered, (2) assist him or her in exploring options within or related to that vocation, and (3) develop his or her salable skills in every possible way so that at the time of graduation the individual has a choice of whether to go to college or get a job, knowing that he or she is well prepared for either.

> Let's speak frankly. The handicapped person does not seek pity and doesn't want a job in which he or she gets a free ride. They would like to be contributors to society and they know they can be productive, given the right opportunity and the proper training. Your job, as a professional person, is to help them attain this reasonable goal in any way you can.

As you consider employment potential, consider the extent to which the following apply.

- The disabilities (physical or otherwise) of the handicapped person that may limit his job entry level opportunities, but in many cases can be compensated for with aids or adapted work stations.
- The job may have some limitations that do not offer the handicapped person a very promising future.
- Once a match is made between the person and a vocational area, it's quite possible to "tailor" that person's abilities and the job so that effective job performance is fairly well assured and a career opened up.

On the practical side of things, you should be aware that your effect on the handicapped individual is more than in vocational development alone. You are dealing with a whole person, who can grow a great deal under your guidance in social development, intellectual development, and personal development.

- Your classroom can be a turning point where companionship and friendships with nonhandicapped persons are formed and better understandings of each other's values are developed by both the handicapped and nonhandicapped students.

- Your classroom can be a place where the handicapped person's mental abilities are utilized to solve practical problems, sometimes quite ingeniously.

- Your classroom can be the place where the handicapped person produces something real and tangible for the first time or where he or she discovers his or her own personal worth in terms of a paycheck.

Think about it. It's a remarkable opportunity.

Expectations and Goal Setting. In spite of what you have just read, you are not expected to be a miracle worker. You and the handicapped student will be more likely to reach and surpass your expectations if you set reasonable goals to begin with.

Argument:	"I have standards to maintain in my program. Vocational education has to guard against lowering those standards if its graduates are to be certified as competent and ready for work."
Rebuttal:	"Standards are rules set by authoritative decision, and make no allowance for individual differences. The world of work does allow for individual differences. In fact, it thrives on them. Perhaps you should be thinking of criteria instead of standards, for criteria are a way of describing quality performance according to what can be done, not what must be done. After all, the name of the game is to have each student reach his full potential, whatever that may be."

You don't set reasonable goals alone. You do it with the student and, typically, with the special education teacher or resource specialist for that student. We'll have more to say about that later, but for now you should keep in mind that the student's work in your classroom should be meaningful to him vocationally and personally.

Influences on Performance. Whether the handicapped student succeeds in your classroom is, in large part, a function of what you do and what kind of help you provide. As discussed subsequently, you should know that lack of funds should not be the problem. Various sources of supplemental funds are available to be used for the handicapped. Funds for buying necessary equipment, paying for facilities modifications to accommodate wheelchairs, paying to get special teacher training, and other improvements are available through appropriate channels.

Probably the most important influence on the handicapped student's performance will be the people you involve as you work with him or her. Here's a listing of some of the more important people you should cooperate with.

- The special educator - the person whom the handicapped student most closely relies on in most schools. Professionally trained and ready to cooperate, he/she will help you to avoid mistakes rather than make them.

- The classroom aide - a person you may not have as yet. If special assistance during class hours or tutorial help out of class is necessary (not for your sake but for the student's), you may find this person invaluable, a good extension of yourself.

- Occupational therapists - have been very helpful in specifying the kinds of performance handicapped persons can do. They can help in the matching of physical potential to appropriate vocational goals.

- Rehabilitation counselors - providing a valuable link to resources, specialized training and post-school vocational follow-up leading to employability. Cooperation between school and rehabilitation personnel frequently pays real dividends.

- Parents - the unsung heroes. They have lived with the handicapped child long enough to learn a few things that you might like to know. Remember, too, you need their support at home while you interact with their child at school.

- Employers - a key to on-the-job success in work study and work experience programs. The flexibility and positive support of the employer is one of the biggest boosts a handicapped student can get.

- Vocational committees - most vocational education programs have one. It may include a subcommittee for the handicapped or have handicapped persons on the committee itself. Remember, committees are most helpful when the members can attract the broad based community support that you and the handicapped student need.

- Volunteers from the community - many persons would work with the handicapped student when given the chance. Contacting appropriate local volunteer groups can lead to surprising amounts of help.

- Medical personnel - they are as much interested in preventing medical problems as curing them. If you feel that there are tasks which might be risky for your handicapped students, check them out. Get to know your student's physical limitations.

Teamwork assures appropriate vocational experiences for handicapped students.

Legislation at the Federal Level

Because vocational education is a realistic way of preparing students for later life and a gainful occupation, it follows that handicapped persons who can be productive members of society and who will work at some future time with non-handicapped persons should be afforded an opportunity to be a part of regular vocational programs whenever possible. Likewise, non-handicapped graduates of vocational programs are more apt to accept co-workers who are handicapped if they have learned during their schooling that these persons can get jobs done and in no way present a deterrent to their own performance.

The Vocational Education Act of 1963 together with the Vocational Education Amendments Act of 1968 (Public Law 90-576) assure that any school district offering vocational education will do so on an equitable basis, even though students may have a disadvantaged background or be mentally or physically handicapped. Part B in the legislation makes provision for the modification of services and special supportive assistance that are often desirable when handicapped students are involved. These "earmarked" funds can be used in a number of ways, depending on local needs and priorities. A wide variety of program and service modifications have been acceptable, including the kinds of expense shown on the next page.

It is important to realize that many of the options listed in this table are not needed continuously. Interpreter services, for example, may be very important for a few weeks, then diminish in necessity until at some point they become superfluous. Also, many of these expenses, such as ramps and rails, are one-time-only requirements.

TYPES OF PROGRAMS AND SERVICES COVERED BY FEDERAL LEGISLATION

1. Surveys by contract or by staff members to identify
   a. Handicapped population
   b. Methods, materials, equipment and techniques utilized in providing vocational education programs, services, and activities for handicapped persons
   c. Occupational opportunities available to the handicapped
   d. Other agencies, organizations and individuals who are concerned with and knowledgeable about education of handicapped persons
   e. Extent of vocational preparation being provided by other agencies and organizations
   f. Areas in which programs are needed (geographic, population groups, manpower needs, etc.)

2. Recruitment and promotional activities designed to reach handicapped persons, potential employers and potential teachers, and to develop community participation and support

3. Scheduling modifications which require
   a. Additional faculty time
   b. Extended school day, week, or year which requires additional faculty time and other related expenses
   c. Individual instruction

4. Formation and servicing of advisory committee for the handicapped

5. Formation of and participation in activities of coordinating committees to include travel expenses, additional time of assigned faculty member, and additional clerical expenses

6. Modifications of regular program
   a. Special equipment and facilities modification necessary for handicapped persons if they are to succeed in a regular vocational program--includes purchase, repair, and maintenance
      (1) Special materials or signal systems
      (2) Ramps, handrails, and modified work stations
      (3) Simplified equipment and alternative controls for equipment
   b. Curriculum modifications for individual students which may involve additional expenditures
      (1) Additional time allotment needed for skill development
      (2) Special workbooks and/or textbooks
      (3) Task analysis

c. Educational services which are supplementary to regular programs and are specifically needed by reason of the handicapping condition
   (1) Psychological services; testing, evaluation, consultation services which are additional to those provided to non-handicapped students
   (2) Reader services for the visually handicapped
   (3) Guide services to lead handicapped students to classes, restroom, bus, etc.
   (4) Interpreter services for the deaf
   (5) Tutorial services
   (6) Teacher training activities
   (7) Vocational orientation for handicapped persons
   (8) Remedial education
   (9) Educational specialists, speech therapists, teachers of the deaf, teachers of the blind, etc.
   (10) Consultation services which may require extra time in meeting with parents
   (11) Job placement coordinators, job finding, placement, and employment follow-up services
   (12) Program and curriculum development
   (13) Guidance and counseling services which are in addition to that provided to nonhandicapped students
   (14) Transportation services which are in addition to those provided to the nonhandicapped
   (15) Rental of classroom and office space
   (16) Minor remodeling and alterations of previously completed building space
   (17) Contract with a private agency to provide program services and activities which the local educational agency cannot provide

Of course, other federal legislation has important ramifications as well. The Education of the Handicapped Amendments of 1974 (Public Law 93-380, Part B) makes clear that

> "to the maximum extent appropriate, handicapped children, including children in public or private institutions or other care facilities, are educated with children who are not handicapped, and that special classes, separate schooling, or other removal of handicapped children from the regular education environment occurs only when the nature or severity of the handicap is such that education in regular classes with the use of supplementary aids and services cannot be achieved satisfactorily."

Public Law 93-380 further stipulates that grants and contracts are authorized for developing and operating a

> "specially designed or modified program of vocational, technical, post-secondary or adult education for deaf or other handicapped persons."

Priorities are to be given to a) programs serving multi-state regions or population centers, b) adaptation of existing programs, and c) programs serving areas where a need is clearly demonstrated.

The Education for All Handicapped Children Act of 1975 (Public Law 94-142) is recent legislation having broad significance on educational services at state and local levels. This legislation adds further emphasis to the concept of "mainstreaming" the handicapped and specifies that the least restrictive educational environment should be provided, consistent with the handicapping condition and the potential of the individual. Certainly for a large proportion of handicapped students, participation in regular classes for a portion of the day is both practical and appropriate. Public Law 94-142 provides special funds for the elimination of architectural barriers in educational facilities where these interfere with the handicapped person's receiving full services.

As this act is implemented, the federal government will assume an increasing share of the expenditures associated with the education of the handicapped. Thus, in 1978 they will assume 5% of the costs, increasing to 40% by 1982. Meanwhile, there will be a greater trend toward

distributing funds directly to local education agencies rather than to the state agencies; by 1979, some 75% of the available funds will be received at the local level.

The Rehabilitation Act of 1973, together with the Rehabiliation Act Amendments of 1974, is another important piece of federal legislation that is designed to help handicapped persons vocationally. The federal program of vocational rehabilitation services is carried out in the form of grants-in-aid to state and local governments. At the community level, once the potential for vocational placement is established for an individual, handicapped clients can receive help in numerous ways through their rehabilitation counselor (acting in the capacity of an ombudsman). For example, they can receive specialized equipment, transportation, books and materials, special and tutorial services, help in communication or interpretation, and such assistance as is necessary to develop a) living skills, b) occupational readiness, and c) job placement.

First priority is given to the more severely handicapped who nevertheless have vocational potential. Emphasis is placed on interagency cooperation, the elimination of facility and transportation barriers, and the writing of individual rehabilitation plans for every client.

It is important to know that vocational rehabilitation service is not restricted to clients that have already left high school. In some instances, cooperative arrangements between the Department of Rehabilitation and local school districts have proved to be very important contributors to full service programs.

Before continuing, check yourself. Can you identify similarities of purpose in the three federal programs already described?

Do you see how different types of funding needs at the local level can be met through one or more of the enabling acts?

What is the major significance of the federal legislation for vocational educators?

Legislation in the State (California)

Various sections of the Education Code, the State Plan for Vocational Education, and the California Master Plan for Special Education are all concerned with defining and describing the ways and means for suitably modifying educational services to meet the needs of handicapped students and for coordinating with other state departments (such as the Department of Rehabilitation) to ensure that appropriate vocational services are available to the handicapped person during and after he or she has left school.

Education Code 7586:

The Legislature hereby recognizes that it is the policy of the people of the State of California to provide an educational opportunity to the end that every individual leaving school shall have the opportunity to be prepared to enter the world of work; that every individual who graduates from any state-supported educational institution should have sufficient marketable skills for legitimate remunerative employment; that every qualified and eligible adult citizen shall be afforded an educational opportunity to become suitably employed in some remunerative field of employment; and that said opportunities are a right to be enjoyed without regard to race, creed, color, national origin, sex, or economic status.

As one would expect, the policies of the state agencies are in close accord with the respective federal goals and guidelines. Rather than describe the state programs in detail, then, here are brief highlights of importance to individual handicapped persons.

The California Plan for Vocational Education. This comprehensive document, available from the Office of the State Director of Vocational Education in Sacramento, spells out the terminology, legal citations, procedural guidelines, and functional relationships of various vocational programs carried out at the secondary and post-secondary levels. For handicapped persons there are specific stipulations in the Administrative Handbook:

- At least 10% of the total allotment of federal Part B funds are intended for serving the handicapped.
- The handicapped person in need of vocational education will be provided with the necessary educational services to assist him in overcoming his handicapping condition. Such information obtained in the identification and assessment will provide the basis for the special service to the individual who is handicapped. Efforts shall be made to enroll those individuals who can benefit in regular vocational education programs.

- Individual assessment of every handicapped person shall be emphasized to determine the approach to use in providing vocational education. Career development goals are to be given consideration in any specially designed program, service, or activity.

- In addition to emphasis by the local educational agency to identify, assess, and recruit the handicapped person, emphasis shall be given to the development of programs and services especially designed to compensate for such handicaps. These programs and services should be comprised of, but not limited to, the following:
  - (a) Specialized vocational counseling
  - (b) Innovative recruitment activities
  - (c) Use of teacher aides
  - (d) Tutorial services and assistance
  - (e) Integration of basic education and vocational subject matter
  - (f) Team teaching in special vocational programs
  - (g) Curriculum development and revision
  - (h) Programmed and individualized instruction
  - (i) Special teachers (credentialled and noncredentialled)
  - (j) Supportive services designed especially for the handicapped student
  - (k) Cooperative vocational education and work-study arrangements
  - (l) Modification of student-teacher ratio
  - (m) Special teachers for job readiness evaluation
  - (n) Extended community involvement
  - (o) Arrangements for transportation

- It is highly recommended that, when applicable, local educational agencies combine vocational education funds with other financial resources to provide for increased effectiveness and impact in vocational education for handicapped persons.

It is especially important to note this last point. It clearly indicates that shared support, from special education and from vocational education funds, is recommended.

The California Master Plan for Special Education (1974). This is the basic resource document describing the comprehensive approach to services being sought in the state. One of the major goals of special education listed in the master plan is

> "Occupational preparation--to assist pupils in preparing for careers, ranging from working at home to full-time employment."

and a paramount goal is

> "Reduction of the impact of disabilities--to provide individually tailored programs which reduce or eliminate the handicapping effects of various disabilities on some exceptional children. Individuals must be educated, however, in terms of their learning abilities, not their disabilities."

Thus, one important element in a comprehensive plan of special education in California is that it must

> "Provide for career and vocational education and for work experience and work study for those pupils who would benefit from them."

Moreover, the reorganization of manpower called for in the Master Plan states that

> "Special education should offer consultation to regular teachers and train them to deal with those exceptional individuals who can be integrated into regular programs."

> In practical terms, then, the special educator continues to bear the central responsiblity for the development of the handicapped student's vocational potential, through cooperative, mutually assistive arrangements with regular vocational educators.

As indicated previously, cooperative programs have been worked out between the regional office of the Department of Rehabilitation (there are 26 offices throughout California) and certain local school districts which effectively supplement the resources and personnel available to vocationally prepare the handicapped. For example, a local school district investment of $14,000 might be matched on a 4:1 ratio, making possible the appointment of a full-time vocational rehabilitation counselor and the provision of other special services. Selaco-Downey High School, in Los Angeles County, is but one location where a well articulated cooperative plan has benefited deaf students.

Of course, any individual handicapped person in a high school vocational education program or a regional occupational program may apply for client status with the Department of Rehabilitation. If he or she is eligible (according to the criteria of severity and employability), he or she will be entitled to receive special help irrespective of whether a cooperative program exists between the school district and the vocational rehabilitation regional office. It should also be noted that severity, as the Department of Rehabilitation uses the term, implies that the client would normally require multiple vocational rehabilitation services over an extended period of time.

What sort of objectives are set for students participating in a cooperative program between the school and the Department of Rehabilitation? Here are some examples for a particular deaf student. They are tentative objectives that will be revised as appropriate during training.

WORK EXPERIENCE PLAN: Vocational Objective (tentative):

INTERMEDIATE GOALS:

1. To provide an understanding of job requirements that are important for any job, regardless of the type of work or skills involved. Examples are: A. being on time, B. the relationship between salary and productivity, C. the relationship between salary and level of skills, D. job success as a function of cooperation with supervisor and co-workers.
2. To overcome, as much as possible, the experiential deprivation of hearing impaired adolescents through exposure to several different work experience jobs.
3. To analyze client's vocational weaknesses and provide relevant experiences to help him overcome them.
4. To promote through relevant work experiences an ability to work cooperatively with supervisors and co-workers.
5. To provide an understanding of social legislation related to employment. Examples are: A. Social Security, B. Unemployment Insurance, and C. Workmen's Compensation.
6. To provide through actual work experience, an understanding of client's limitations as related to work possibilities.
7. To provide an opportunity for developing productivity through a "sheltered" and non-threatening job situation, without fear of job termination.

The form on the following page is an example of program planning for the student, as drawn from the school's file. You will note that it covers basic work requirements, and tells what evaluation is expected.

DEPARTMENT OF REHABILITATION

REHABILITATION PROGRAM REPORT (Part II)

DR 2288 (5/75)

CLIENT'S NAME (Last, first, middle initial)

CLIENT'S SOCIAL SECURITY NO. (000-00-0000)

INDIVIDUAL REHABILITATION PROGRAM (Continued)

1. Responsibilities of the individual in carrying out the program participation in costs Benefits from other resources

1. I understand that it is my responsibility to be on the job at the assigned time and to not leave before my work hours are finished.
2. I will cooperate with my supervisor on the job and do all work assigned to me even if I may not like the particular task involved.
3. If I am ill or miss school for any reason I will have someone call my supervisor to inform him that I will be absent that day.
4. I will ask my supervisor on the job for his name and phone number and carry it with me so I will have it if I need to call him.
5. If I have problems with my supervisor on the job I will go to my rehabilitation Counselor or my work experience teacher (Mrs.) and ask for help with the problem.
6. If i do not understand my teacher or my supervisor I will ask other people for help.
7. When my Rehabilitation Counselor or my Work Experience Teacher decides that my job should be changed I will accept the new job and work in it to the best of by ability.
8. When I leave school to go to work or leave work to go to school I will not delay, stop to visit, or stop to talk with people. I will go straight from one place to the other as quickly as possible.
9. When I do not like a particular task on the job I will talk with either my Rehabilitation Counselor or my work experience teacher about my feelings.
10. If told that I must dress or groom myself in a certain way for my work experience job I will do as instructed.

How progress will be evaluated

Evaluation of Progress will be an on-going process. This shall be done as follows:

1. Monthly employer reports; On a five point scale, the employer indicates how the student is doing in terms of QUALITY of work, QUANTITY of work, COOPERATION with fellow workers, COOPERATION with supervision, and level of ACHIEVEMENT.
2. Weekly Career Opportunity meeting with Work Experience Teacher, School Counselor, school administration, and Prevocational Teacher for the purpose of evaluating progress, defining problems, finding and implementing solutions.
3. Consultation with employers when the above indicates a need.
4. Observation of behavioral changes in clients thru one to one interaction, either at school or on the job.

A Statement of Rights has been provided to you on the application form. If you have any question about your rights, please contact our office. The statements on the Rehabilitation Program Forms represent the services to be secured or provided in accordance with our planning with you in development this program. If you do not understand the contents and provisions of this program, or if you feel you cannot carry out its provisions, please write your comments on this form and return it to our office.

ANY PART OF THIS PROGRAM IS SUBJECT TO REVISION BASED UPON NEW INFORMATION OR CHANGE OF CONDITIONS.		CLIENT'S SIGNATURE (For 760 Program only)	DATE
REHABILITATION COUNSELOR'S SIGNATURE	DATE	REHABILITATION SUPERVISOR'S SIGNATURE	DATE

The actual individual rehabilitation report given on the previous page is hard to evaluate without knowing the student and the circumstances. Nevertheless, it's probably quite different in style and content from one that would fit your own student(s). What might some of these differences be?

A third important federal program that can be of direct assistance to unemployed handicapped persons is the Comprehensive Education and Training Act-CETA (Public Law 93-203) passed in 1973. Intended as flexible, broad-purposed legislation, it seeks to encourage maximum employment for target special needs groups through locally administrated programs. It provides on-the-job training for moderately handicapped individuals who need to further develop their skills. Because rehabilitation services emphasizes the more severely handicapped, CETA and rehabilitation services perform a complementary function (Urban Management Consultants, 1976). Further information on CETA can be obtained through the regional office of the Dept. of Health, Education and Welfare. (In California, Regional Office IX is located in San Francisco.)

Check your understanding of California legislation and its implications by deciding the most appropriate choices.

- The person having the primary responsibility, in California, for indentifying handicapped students who could benefit from regular vocational training at the secondary level is the

  (vocational educator) (rehabilitation counselor) (special educator)

- The priorities for service within vocational rehabilitation are given to

  (relatively severe handicaps) (cooperating school districts) (mainstreamed students)

- The 10% funds in Part B of the vocational education legislation are to be used for

  (special educators' salaries) (modified vocational education) (rehabilitation)

If you are not sure of your answers, this is a good time to review the preceding pages.

Capabilities and Characteristics of Handicapped Persons

First and foremost, handicapped persons have all the diverse characteristics of non-handicapped persons. In a word, they are individuals. Each is a unique being with combinations of strengths and limitations, interests and disinterests, and vocational knowledge and naivete. Frequently, the handicaps aren't visible, and instructors are more aware of individual differences than they are of the existence of handicaps!

It is characteristic of handicapped persons that they have a more limited experience base than non-handicapped students by the time they reach adolescence. Largely because they have been lacking in opportunities, they often have a greater need to develop pre-vocational skills or awareness than do their non-handicapped counterparts. (For example, handicapped students' shopping opportunitites are often less than those of non-handicapped students, so their awareness of comparative pricing of goods in retail sales might be minimal.)

Who Are the Handicapped?

- Handicapped persons are mentally retarded, hard of hearing, deaf, speech impaired, visually handicapped, seriously emotionally disturbed, crippled, or other health-impaired persons who by reason of their condition cannot succeed in regular vocational education programs without special educational assistance or who require a modified vocational program. (California State Plan for Vocational Education, 1972.)

One of the problems that continually seems to arise with the handicapped, and many times unnecessarily so, is their classification and labeling. Understandably, classifications and groupings have importance from the standpoint of administrative accounting and (as is true in this series of modules) for organizing relevant instructional materials. The reason for this is a straightforward one; there are particular techniques that can be very successfully employed for some handicapped persons that are unnecessary or even wasteful for others with different handicaps.

The California Master Plan for Special Education groups the various types of handicaps into four categories.

1. Programs for the communicatively handicapped

   Deaf
   Deaf-blind
   Severely hard of hearing
   Severely language handicapped (including aphasic)
   Language and speech

2. Programs for the physically handicapped

   Blind
   Partially seeing
   Orthopedically handicapped
   Other health impaired minors (including drug dependent and pregnant minors)

3. Programs for the learning handicapped

   Learning disabilities
   Behavior disorders
   Educationally retarded (EMR)

4. Programs for the severely handicapped

   Developmentally handicapped
   Trainable mentally retarded
   Autistic
   Seriously emotionally disturbed

That there are flaws in this classification can hardly be disputed. The functionally blind, for example, surely are "communicatively handicapped" in that they cannot deal with the communication medium of print, read meters, and perform other "visual" skills unless special compensatory devices are available.

Another flaw in the scheme of classification arises from the fact that the primary handicap is often accompanied by some other disabling problem. Thus, deafness itself becomes a contributor to poor speech and to withdrawn social behavior. What needs to be kept in mind, even as we discuss different handicapping conditions, is that there are no discrete boundaries nor uniform group types. You shouldn't be surprised to find large variations in the speech production capability of deaf persons; the awareness of surroundings and mobility of the blind; the strength and dexterity of the orthopedically handicapped; or the kinds of tasks that can be learned by the mentally retarded, to consider just four groups. Needless to say, the severity of the condition has a direct bearing on the nature and extent of

adaptiveness that is feasible and called for. Consider blind typists for a moment. If residual vision is marginal, it may be that magnifiers, light intensifiers or other adaptive aids are sufficient. However, even when there is no vision there are still adaptive aids (such as optical to tactile converters) that can be fastened onto the typewriter to allow the blind typist to proof and correct a typed copy.

Another consideration to keep in mind is that many handicapped have learned to cope quite well and their resourcefulness in "doing the impossible" is a constant source of pleasant surprises. Familiar examples of this resourcefulness are the various Christmas card illustrations that have been beautifully painted by persons who have no use of their hands. In other words, handicaps make tasks difficult but not necessarily impossible... the motivated, trained individual can overcome a lot of difficulties.

There are a variety of ways that the effects of the handicapping condition may be alleviated. These include

(1) medical or therapeutic correction and treatment

(2) technological devices, such as motorized wheelchairs, hearing aids, environmental sensors, and audible calculators

(3) personal services, such as interpreters, counselors, and provision of assistive devices.

(4) environmental alteration, including ramps, modified work stations or jibs, and last, but not least,

(5) training to develop adaptive techniques and methods of achieving particular tasks.

The vocational educator can't be all things to all people nor can he solve all these problems alone. As for the above list, he's not a doctor or therapist; an engineer or inventor; a driver or interpreter, though he may be a counselor; occasionally, though not customarily, he may carry out building alterations or fabricate special purpose tools. It is not unreasonable to expect him to be a creative, flexible teacher.

As your new drafting class reports in for instruction, you realize that a paraplegic student cannot get his wheelchair under the drafting table and cannot reach the supply cabinet. What action or actions might be appropriate? (Consider alternatives 1-5 above)

Taking a Positive Approach

Increasingly we hear or read about remarkable achievements by handicapped persons. Sometimes these border on the heroic, but more often they are achievements born of great patience, perseverance, and a positive attitude. Beethoven was deaf, yet composed exquisite music; Roosevelt was paralyzed, but led the country in wartime; and Ed Furgol had a shortened, rigid left arm but won the U. S. Open Golf Championship. More recently the press, in newspapers and magazines, tells us of the accomplishments of Ed Roberts, whose status as a quadriplegic has not prevented his energetic leadership of the California State Department of Rehabilitation; of Celestine Tate, who has proven (in court) her ability to care for her baby even though she is limbless; of Gordon Gund, whose blindness has not prevented him from being a skier, world traveler, director of two banks, and a principal in a large business development firm; and of young Kirk Stephenson, who won a restricted pilot's license in spite of being deaf and mute.

The list of successful disabled persons is a long one, as is evidenced by some six fascinating volumes of personal profiles available from the People to People Program, Washington, D.C.

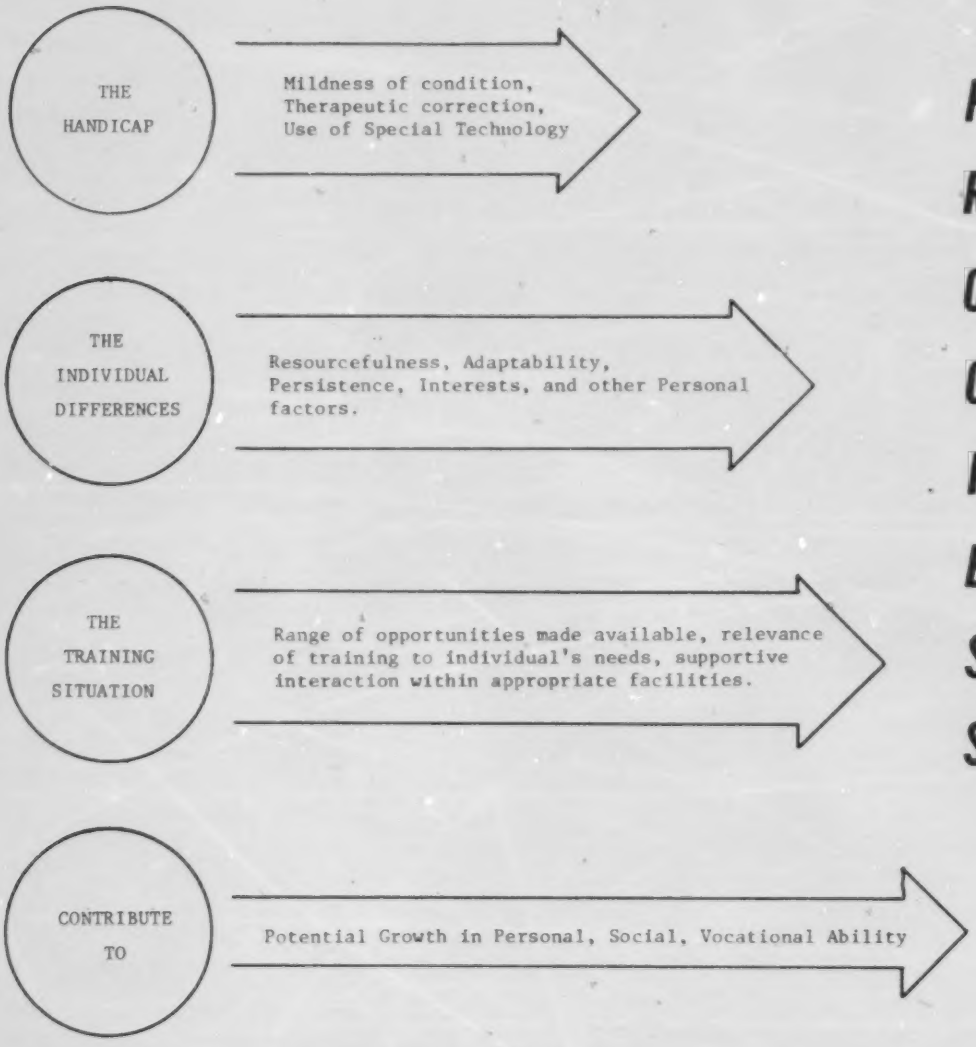
Younger people are "in the act" too. Tracy Reynolds is blind but graduated from high school a year early with honors...she skis avidly and says, "I don't have any problems. I consider my blindness an inconvenience rather than a handicap." Her point of view is shared by many young handicapped persons.

This positive attitude is crucial. It's the product of encouragement by others, a willingness to attempt new tasks, and the accomplishment of concrete daily goals. These small gains have great personal importance to the handicapped person in building self-confidence and self-esteem. The vocational educator may not always realize when the handicapped person has accomplished something for the first time, but he should be quick to acknowledge any student effort that reflects individual growth, for growth in individual potential is the name of the game. Not only is the worth and dignity of the individual enhanced, but his or her importance and contribution to society is furthered as well. Like the student, you, in

the role of mentor, will help to build the individual's competence and worth in small increments. You will do it through positive reinforcement and by offering your friendship and respect, your knowledge and skills, and individualized instruction in accordance with each student's special needs.

> The deaf boy in your class no longer seeks information only from you, but now interacts with classmates as questions come up. What kind of gain has he apparently made? What implications could this have for his eventual acceptance by employer and co-workers?

The diagram below emphasizes the cumulative effect of positive influences on student growth.


THE HANDICAP
Mildness of condition, Therapeutic correction, Use of Special Technology
THE INDIVIDUAL DIFFERENCES
Resourcefulness, Adaptability, Persistence, Interests, and other Personal factors.
THE TRAINING SITUATION
Range of opportunities made available, relevance of training to individual's needs, supportive interaction within appropriate facilities.
CONTRIBUTE TO
Potential Growth in Personal, Social, Vocational Ability
PROGRESS

It might be helpful to review some of the key ideas in this section, for they should help you to help the handicapped student make real progress.

- First, get to know something about the nature of the handicap and its severity. Get an indication of the kinds of basic skills the student <u>can</u> perform. Adjust your assessment.

- Second, get to know the person, particularly his or her willingness to try new things and persist in seeing them through. Adjust your support and encouragement accordingly.

- Third, explore ways that the training situation itself can be improved to reduce the barriers to effective performance. Adjust your classroom and your teaching procedures accordingly.

Training the Handicapped for Competitive Employment

What does it take to build a successful vocational training program... one that includes handicapped persons? Well, at a minimum, it should:

- establish realistic goals...not tied to numbers of cases but to the needs of individuals served
- reflect cooperative planning of activities.. not only between school district staff but also advisory committees, employers, and other concerned parties
- match student readiness to vocational opportunities...encompassing career awareness, pre-vocational orientation, vocational skill building, work exploration, and vocational placement
- make adequate provision for program components... including personnel, facilities, equipment, and curriculum alternatives
- evaluate program effectiveness...and modify it accordingly.

> At this point you may be saying, "Aha, that's not different from what any regular vocational program should do." You are absolutely right. Remember, the basic assumption is that many handicapped persons can be served within regular vocational programs.

Let's be a little more specific about training for the handicapped. Experience shows that when compared to the average nonhandicapped student, the handicapped may have somewhat greater need for:

- development of prevocational knowledge and attitudes
- pre-training skill assessment
- assistance in program planning and positive reinforcement during vocational counseling
- vocational class opportunities that lead to feelings of achievement rather than failure, including well-planned individualized instruction and attention to special needs that arise from the particular handicapping condition
- placement in favorable work study or work experience stations
- coordination and follow-up with other staff, particularly the special education teacher, and with work station supervisors

In the following pages we will discuss each of these considerations in detail.

> Review the list on the previous page. It is not an exhaustive list and appropriate things can be added to it. Can you suggest an additional need related to goal setting and one related to social interaction?

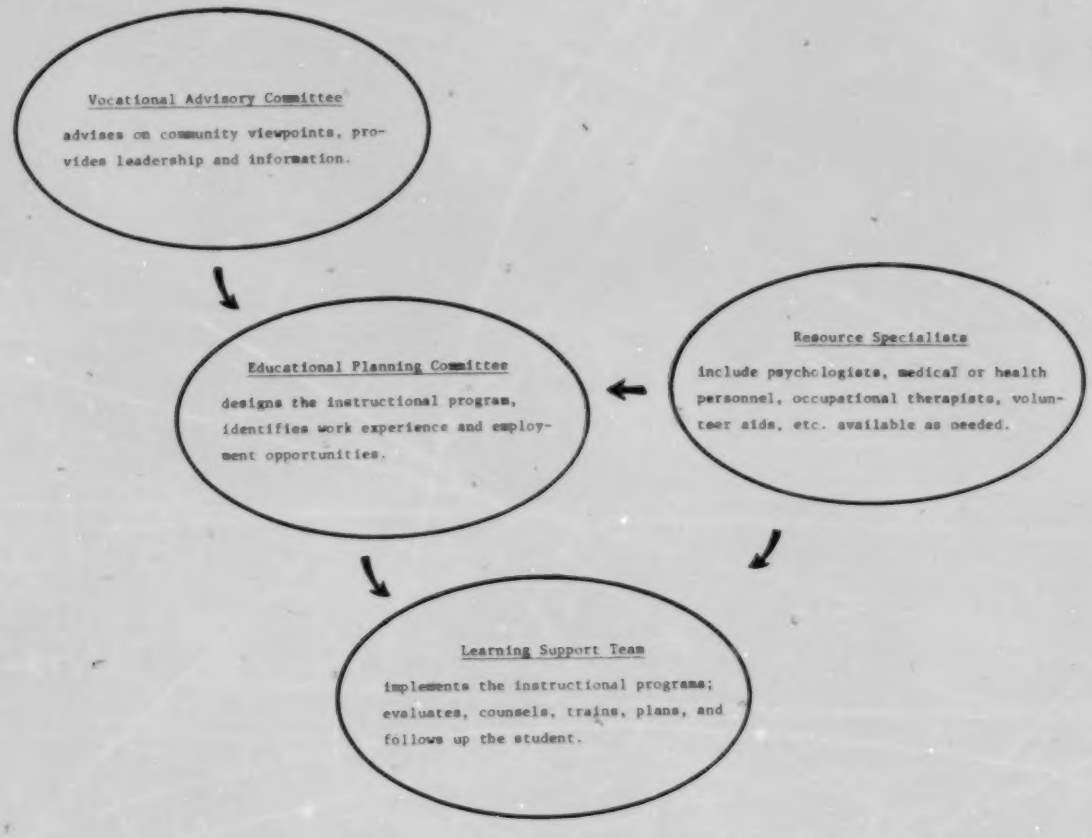
Cooperative Planning

It has been mentioned several times that cooperative planning is both appropriate and necessary. To begin with, your school district most likely has a well-established vocational advisory committee. This group includes representative leaders in the business, industry, civic, and agricultural areas, together with parent(s), educator(s), school administrator(s), and, hopefully, a spokesperson for the handicapped. The advisory committee is an excellent source of information; they can sense the pulse of the community and suggest where the school's vocational emphasis should be put if the transition from school to community is to be a smooth one. This group is a valuable one in attracting a wide base of community support, particularly in setting a receptive climate for handicapped students in the job market.

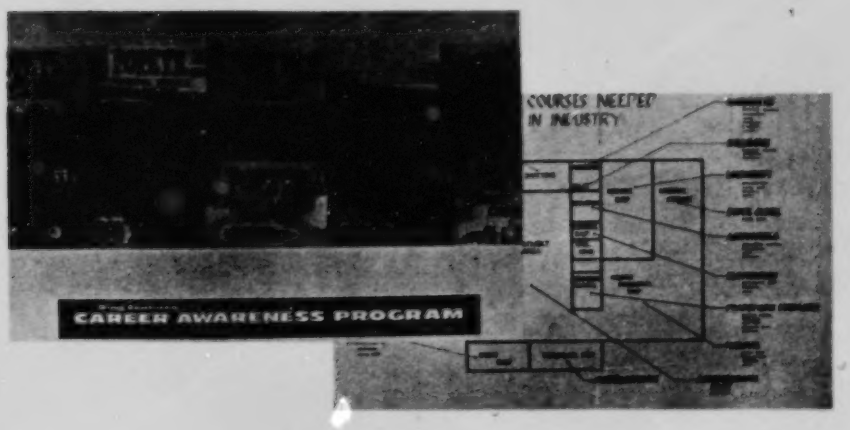
At a second level, an educational planning committee should be concerned with the actual curriculum development. In order to provide meaningful programs for the handicapped, the composition of this group should definitely include vocational educator(s), a school administrator, a special educator, a work experience or work study coordinator, and may benefit from representation from employers, rehabilitation counselors, or others who will later have occasion to directly interact with the student.

The last cooperative group is the learning support team. Its members are those persons whose work responsibilities are, through direct contact, aimed at helping the student to increase his or her employment potential. All three of the terms used to label this group have important meaning. "Learning" (as opposed to instruction) shows that the emphasis is on student development. "Support" acknowledges that the relationships are collaborative and helpful in nature. "Team" implies concerted effort in a common direction. Typically, the membership of this group is similar to the planning committee, though the school administrator may not be involved on a regular basis. In a nutshell, the learning support team is where the action is and where the rewards are.

Here's a diagram which illustrates the interrelationships and continuity of these three groups. Notice that something has been added...a pool of resource specialists. Although not customarily meeting with any of the three coordinating groups, a nucleus of persons in the school and community can typically be turned to for help in particular stages of the program implementation.


Vocational Advisory Committee
advises on community viewpoints, provides leadership and information.
Educational Planning Committee
designs the instructional program, identifies work experience and employment opportunities.
Resource Specialists
include psychologists, medical or health personnel, occupational therapists, volunteer aids, etc. available as needed.
Learning Support Team
implements the instructional programs; evaluates, counsels, trains, plans, and follows up the student.

As the following illustrations make clear, career orientation can be general in nature, surveying a variety of occupational fields, or it can be specific in nature, where the exploration of career alternatives is tailored to individual interests.



General Career Awareness Information

Specific Career Exploration and Consultation

Development of Prevocational Knowledge and Attitudes

Early in their schooling, handicapped youngsters (and their parents) should be afforded career awareness opportunities, possibly through discussion, reading, field trips, films and slides, guest speakers, or by visiting workers at their job stations. Career awareness, a concept advanced by former Commissioner of Education, Sidney P. Marland, is not comprised of separate classes. Rather it is an orientation to the world of work that should occur within the whole curriculum. It presumes that by the time the student leaves high school he would have become aware of the following fifteen job clusters.

Agri-Business and Natural Resources
Business and Office
Communications and Media
Construction
Consumer and Homemaking
Public Service
Fine Arts and Humanities
Environment
Health
Leisure (Recreation, Hospitality, Tourism)
Manufacturing
Marketing and Distribution
Marine Science
Transportation
Personal Services

For many students the merits of career planning and vocational preparation will seem vague and even a bit frightening. After all, school is something "known" while earning a living is little more than a remote prospect sometime in the future. The message to convey is a simple one... the more you know about your choices, the more satisfied you will be when you make them. In addition to overall career awareness, pre-vocational orientation typically emphasizes such important factors as:

- developing personal and social skills that affect employability, such as communicating effectively and developing good work habits
- developing daily living skills, including such avocational areas as cooking and serving and managing their own personal resources
- developing process skills related to seeking employment, such as filling out forms and using public transportation
- special skills training related to the handicap, including the use of special aids and appliances to accomplish tasks
- basic vocational skills which involve math, reading, perceptual, or manipulative abilities

Typically some career awareness training precedes formal vocational study but there is no assurance that it will. In any event, vocational educators shouldn't take it for granted that the handicapped student knows much about career options. If there is little evidence that adequate orientation to the world of work has taken place prior to the student's arrival in the vocational education class, at a minimum, the educator should take extra time to discuss, in simple language, how the particular student's career potential can be enhanced through the vocational classwork you are offering.

Career awareness centers and vocational exploration classes are meaningful avenues by which handicapped and nonhandicapped youngsters can improve their understanding of the world of work and the alternatives open to them. For the most part these early experiences acquaint the youngsters with what other people do and often suggest the kinds of skills that might be acquired if a person chooses to pursue a particular vocation or career. It is possible, however, that a student might become interested in a vocation for which he has little aptitude or seems to have limited skills to build upon. This may be especially true for handicapped students.

How then, does one know where to begin... remembering that the school's purpose is not to close off options but rather to open them. The place to begin is with pre-training assessment. It's the next concrete step that should take place within a structured vocational program.

> Remember, handicapped students, like nonhandicapped ones, are apt to have widely diverse interests, differing amounts of knowledge about the world of work, and exhibit varying degrees of "good sense" in their judgments about what the future holds for them. Whatever you do, don't underestimate the handicapped student nor add to his or her self-doubts!

Pre-training Skill Assessment

As the handicapped youngster enters the program there are many things that would be helpful, though not essential, to know. These include basic

information about his or her:

- scholastic aptitude and achievement
- social and emotional maturity
- personal interests and aspirations
- health and welfare
- family and close friends

Much of this information can be provided by the special education teacher and some will be a natural result of conversations with the student or with his or her parents.

Of direct bearing on vocational preparation, and therefore of more concern to the vocational educator, are evaluations of general work readiness and performance on meaningful work tasks. As for general work readiness, the vocational educator will want to establish whether the handicapped student can:

- receive and follow directions
- understand and follow safety rules
- work independently
- have reasonable attendance and punctuality

In terms of work tasks, the vocational educator will want to establish:

- the variety of manipulative tasks that can be performed
- the rate with which various manipulative tasks can be performed
- the neatness, consistency and accuracy of skill demonstrated in those tasks.
- the tolerance for respective activities and stamina in physical activities
- the reasoning and decision-making capabilities in relatively complex tasks.

These performance factors are important to "get a handle on" in order to learn what the handicapped student can do, not what he can't do. Watch out though, in case the handicapped person fails to perform a task as requested . You have to be sure (in your own mind) that his or her non-performance wasn't really a result of confusion about directions or an emotional block from being in a test situation.

Assessment with Commercially Available Systems. Where vocational educational programs operate on a fairly large scale and many course alternatives are available, it is quite often the case that work sample evaluations are made with the use of one of a number of commercially available systems. Many of them were originally developed to help assess the employability of the disadvantaged. Some were developed with particular handicapped populations in mind. Even where this was not the case there are likely to be major portions of these commercial evaluation systems that can be used with the handicapped though, as the term implies, the "norms" for the various systems are quite apt to be inappropriate.

At Hacienda, California, at a large Regional Occupation Program, a multi-station, audiovisual system (Singer) is used for handicapped as well as non-handicapped students. It is supplemented by locally developed work sample stations specifically tailored to certain vocational training courses, such as upholstering, that are included in the curriculum. At Fullerton, California, in a high school facility, another commercial performance assessment system (Valpar) is used increasingly with handicapped students. Other prominent commercially available evaluation systems include the TOWER, developed a number of years ago for use with disabled persons; the JEVS, which is organized by "worker trait group" within the Dictionary of Occupational Titles (DOT) and has applicability for the mentally retarded; and WREST, which is a wide-range employment sample test used with both the mentally and physically handicapped.

This module is necessarily limited to a brief overview of the many assessment systems and structural work samples available. Readers who may be interested in learning more about these commercially available evaluation systems (such as their content, source, and applicability) are referred to the State Department unit responsible for Vocational Education as listed in the Resource Section of this module. Alternatively, a rather thorough description of the various measures and critical appraisal of their uses can be found in Donn Brolin's comprehensive text Vocational Preparation of Retarded Citizens (Brolin, 1976).

What do the evaluation systems cover? JEVS, as one example, measures potential skills in fourteen general industrial categories: assembly-disassembly, bindery, clerical, display and printing, electrical, industrial housekeeping, layout design and drafting, mailroom, mechanical, sorting, structural development, textile and tailoring, and metal work.

By comparison, the Singer audiovisual system taps seventeen occupational clusters: basic tools, bench assembly, drafting, electrical wiring, plumbing and pipe fitting, carpentry and woodworking, refrigeration-heating-air conditioning, soldering and welding, office and sales clerk, needle trades, masonry, sheet metal working, cooking and baking, small engine service, medical service, cosmetology, and data calculation and recording.

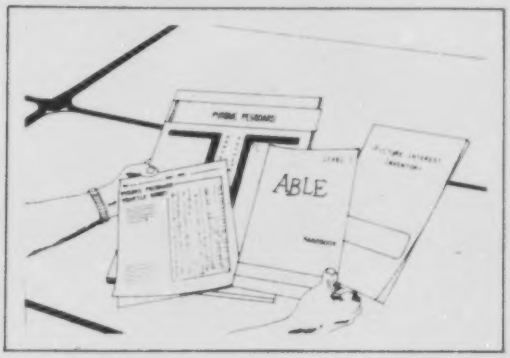
A number of vocational aptitude tests exist which assess particular abilities, such as dexterity, eye-hand coordination, and visual and auditory acuity. Selection of tests in these areas should be tempered by consideration of the relationship between the disability and the job requirements and should be jointly selected with the special education teacher.

Equally important to keep in mind, however, is the need to get a clear picture of the students' vocational interests. While the Strong and the Kuder tests have been widely used, there are alternatives that may be more appropriate for certain handicapped persons. Thus the Reading-

Free Vocational Interest Inventory or the Vocational Interest and Vocational Assessment tests, which are essentially pictorial, may be more useful for the mentally retarded.

Locally Developed Assessment Systems. In contrast to the commercial systems and published tests, many local vocational programs have found it both expedient and worthwhile to develop pre-vocational assessment procedures that are geared to their own students and their own curriculum.

At the Long Beach, California, schools for example, a variety of exercises have been adapted from existing evaluation systems but the emphasis is on locally developed job samples coupled with a variety of pencil tests and behavioral checklists.



VARIOUS ASSESSMENT SYSTEMS

FOR

SAMPLING INITIAL PERFORMANCE

Does any assessment system seem to have "the nod" over the others in terms of suitability for the handicapped? It's hard to say. If one discounts obvious problems (such as the blind not seeing the pictures displayed by the Singer system) and the expense (for initial acquisition of the commercial systems) they all are potentially helpful. On balance, however, it would seem that locally developed systems are apt to be both simple to use and most meaningful to the instructor.

Identifying Appropriate Training Experiences

The information gained in pre-training assessment certainly should be shared with the handicapped student's special education teacher. It also leads naturally to the first of a series of informal vocational counseling sessions between yourself and the student. He or she may reflect skeptism about what kinds of opportunities would be open to him or her. If that's the case, you may be able to point to employment opportunities received by former handicapped students. In any event, you should guard against raising false hopes. It is better to emphasize that employers want people who can do quality work and do it reliably and that the potential revealed in the pre-training assessment plus the training available in class can qualify him or her to most employers' satisfaction.

To help the student understand what is ahead, it is appropriate to outline the kinds of jobs that have been gotten by graduates of the vocational program and briefly describe the accomplishments that will be aimed for in class. Although hear say in the school may have helped to form an idea in the student's mind, your explanations are an important "turn on" to get him started enthusiastically.

It is helpful if the sequence of vocational courses that the student might take are explained in terms of relevant goals and outcomes. Surely the student should know why he is taking a particular course and what he should expect to get out of it.

Which of the following objectives is adapted to an individual who is hard of hearing?

To learn two ways of welding a product to make it attractive and secure.

To learn how to manually set welding flames to the proper heat by sight.

To receive and carry out spoken directions from a shop foreman.

To apply safety precautions when checking and using equipment in the class.

Program planning for the handicapped student is not the sole responsibility of the vocational educator. Remember that the special educator, through a multidisciplinary approach, has the main responsibility for deciding when the handicapped student is ready for a particular course, and ready to be integrated with regular students. Coordination of your informal counseling with that of the school counselor will also help to prevent confusion and contradiction, and will help to ensure support and reinforcement as the student works toward realizable goals.

Work Study, Work Experience, Work Placement and Follow Up. All are extremely important activities for the handicapped student. They give him or her an opportunity to apply newly learned, limited skills to practical work tasks in increasingly natural job environments.

The work study program, which is typically carried out with special educators, provides fairly close supervision and acquaints the student with jobs that are relatively simple. It introduces the handicapped student to typical work related requirements, such as setting time limits on production or working with others in a team fashion.

While work study is tailored primarily for the handicapped, handicapped students in a work experience type of program gain a feeling of achievement by carrying out job tasks essentially similar to those of nonhandicapped persons. Further, these tasks are typically accomplished

in regular community business situations. The handicapped student learns that it is possible not only to be competitive with the nonhandicapped but also comes to realize how unforeseen events and various persons encountered on the job must be coped with if he is to perform his job satisfactorily.

The eventual process of work placement signifies an important step for the handicapped student, for it implies a transition from learning to earning. Most important, it is a time when the handicapped person begins to function as a self-sustaining individual in society, gaining personal pride in the process.

Quite often job placement is arranged prior to graduation. Sometimes it is facilitated by the vocational educator, who may know the employer. It may have been arranged through a placement system developed by the vocational advisory council, or it may have been obtained through efforts and contacts initiated by the student himself. In many instances the employer will be apt to look to the school for evidence that the handicapped person is capable of performing the tasks required. As in school, the emphasis should be placed on the student's positive accomplishments, not on his disability. Of course, the employer will need to know what he has to do to function effectively in working with the handicapped student. Since new cooperating employers have a lot to learn themselves, it is prudent to send capable students to them first...students who require minimal attention, are reliable, and who will reflect favorable credit on the school's training program.

A remarkable range of vocational opportunities exists for handicapped youngsters, but these opportunities must be uncovered. It is essential that adequate support be given by the school to help the individual make a smooth transition into the world of work. Whether the student is leaving high school, junior college or college itself, he or she needs good leads to good jobs. At the secondary level the vocational educator is in a prime position to provide this kind of support.

Not to be overlooked are the important supportive services available from the Department of Rehabilitation. As discussed previously, they are specifically charged with helping qualified handicapped individuals become employed and stay employed. In the large majority of cases, they deal with handicapped persons no longer eligible for vocational training through regular school programs. Coordination with the secondary institution, especially with the vocational educator, should be worked out in advance of the student's departure from high school so that if placement has not yet been accomplished the Department of Rehabilitation can continue to work with the individual on a client basis. It is nothing more than common sense that educational and rehabilitation agencies work cooperatively to assure a continuity of assistance in job placement of the handicapped.

Another approach to employment of the handicapped (inclusive of older handicapped persons as well as those just graduating) are placement services organized and supported on a volunteer basis by businessmen and educators. In Santa Clara County, California, an efficient organization called the Committee for Employment of the Handicapped has developed and circulates a regular newsletter giving the qualifications (rather than the disabilities) of handicapped applicants. It has wide acceptance in the community.

Here are a few examples of applicants as posted in a recent newsletter. Notice the range of skills represented.

Professional- G.B. 2015 Engineering Assistant-Computer Equipment. Design, development, testing, maintenance and installation. Digital technology. Logic design. Degree in electronic technology, 1975.

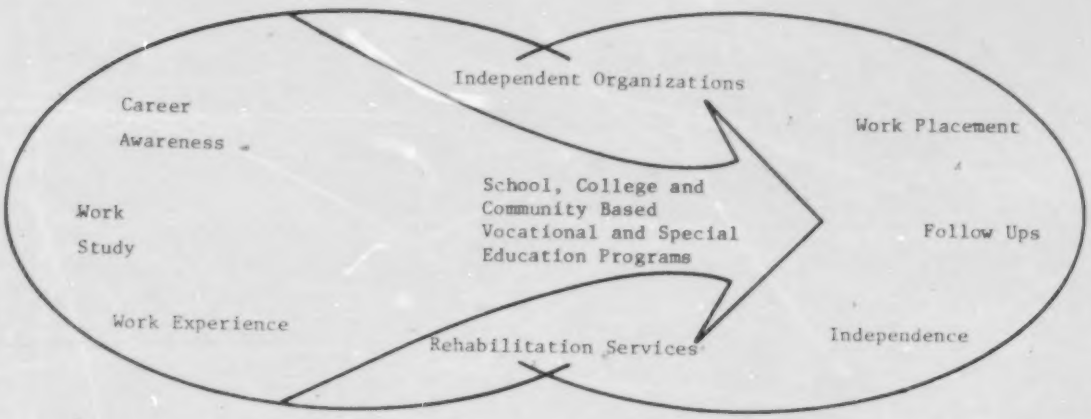
Industrial- G.F. 5912 Electronic Assembler.
One year experience in testing, wiring, inspection, packaging and solder pot operation; uses all small hand tools easily.

Sales/Clerical- L.J. 9331 Billing Clerk.
Ten-key adding, calculator, typing 35 on Selectric. Knows tariffs and bills of lading. Six years with Moving and Storage Company.

Service- R.D. 1506 Food Serviceworker.
One year experience in food service; can operate dishwasher, slicer, grill, mixer and cash register.

Follow-up is a logical extension of job placement. As you help to prepare handicapped students vocationally and help them to gain work experience it is understandable that they might like to communicate with you after they have a job. Perhaps they will seek you out for advice on a problem on the job, or you may contact them to see how they are progressing. In either case, you are likely to find yourself interested and "in touch" to see how relevant and helpful your teaching has been.

So far, we have emphasized two big ideas... (1) handicapped students require a logical progression and growth in vocational exposure and opportunity and (2) the planning of these experiences should be cooperatively carried out, taking full advantage of the eventual interests of vocational educators and special educators and resources available through independent organizations and, if appropriate, the Department of Rehabilitation. The sketch below summarizes this process.



Avenues for Employment and Independence for
Handicapped Students in the Mainstream

Earlier, we pointed out that as a student's classroom-based skills are developed it still can't be taken for granted that they will transfer into a work setting. Why is this? Because the situation, the people, and the expectations are different. In other words, a vocational classroom is a place where every effort has been made to make students feel they belong, a place where they are not yet expected to know, but rather to learn in an understanding and supportive environment. The world of work, however, invests effort where the most productive "pay off" appears to be, often to the definite disadvantage of the handicapped person.

> What are some of the gaps or pitfalls that lead to on-the-job failure for a handicapped person even though he or she has demonstrated effective performance skills in the classroom ? What could you do to prevent them?

Some of the key ideas in this section were:

- It is essential that vocational education programming for the handicapped student be a team effort, not solely the task of the vocational educator.
- There is a variety of information to be learned about the student which can contribute to meaningful planning and to student centered activities.
- Effective training in the classroom can be wasted unless there is effective coordination and follow-up of the student in the work station.

Shaping the Training Environment

In designing instruction for maximum benefit to all vocational students there are certain basic considerations...considerations of what is to be taught, who is to teach it, how it is to be taught, where it is to be taught, and whether it was learned to a satisfactory level for work experience and for job placement purposes.

It is beyond the scope of this module to deal in depth with these various considerations. Indeed, in this module we assume that answers to these questions have already been arrived at in the course of setting up the regular vocational education program, thereby representing a solid base of planning which can be adapted for participating handicapped students. In this module we will discuss the preceding considerations from the standpoint of what special issues may be involved when the vocational student is handicapped. (Even here we will be suggestive rather than all-inclusive simply because the range of needs among the handicapped is complicated by the type of handicaps, severity of handicap, personal motivation, career goals, etc.)

Deciding What Is to Be Taught

Most students want to get jobs. Hopefully, through past efforts of the vocational advisory committee, together with the educational planning committee and the concerned vocational educator, a job market analysis has been accomplished for the school district. Presumably, the analysis has suggested what job clusters exist in relative abundance in the community, or nearby, ensuring that vocational training can be planned to be job relevant from the outset.

Handicapped students are as much interested in job relevant training as are the nonhandicapped, so the job market analysis very likely applies to them as well. One additional consideration is whether the jobs in the community are substantially in firms doing business with the Federal Government in excess of $2500 per year. If so, these firms would be affected under Section 503 of the Vocational Rehabilitation Act, which requires them to design "Affirmative Action" plans for hiring the handicapped. In other

words, job market analysis should be taken into account so that equally trained, handicapped students may be welcomed by companies with such affirmative action programs.

In today's mobile society a person's first job may likely be in his or her own community, but it is often the case that advancement in the career field or changes in career emphasis will require employment in other communities. By comparing the local job market analysis results with the comprehensive DOT (Dictionary of Occupational Titles), the vocational educator can reflect a broader viewpoint in his course planning. He can also establish the essential performance characteristics that should be developed among his students, including his handicapped ones, to enhance their employability. Further, many of the commercially available pre-vocational assessment systems, discussed earlier, are directly related to the various occupational clusters in the DOT. Therefore, the vocational educator can assess incoming students' aptitudes for the kinds of jobs that are locally available and at the same time consider the broader market place.

> An alternative job coding system you may refer to is the Alphabetic Index of Industries and Occupations, used by the Bureau of the Census.

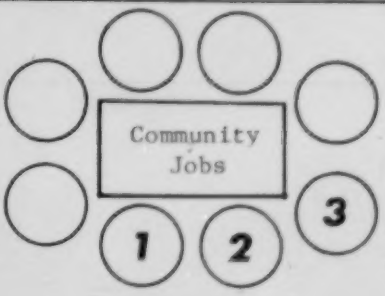
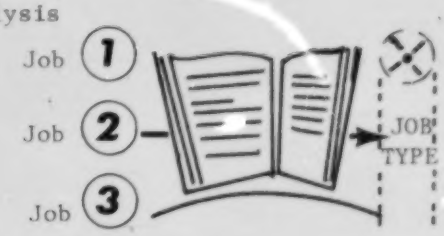
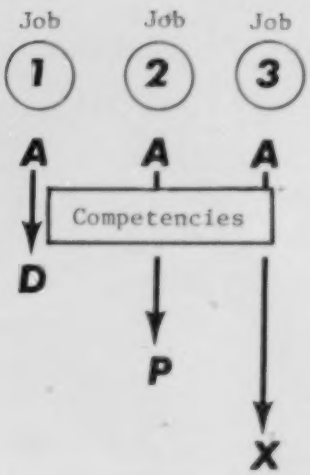
It should be kept in mind that the DOT and the pre-vocational assessment systems are necessarily general in nature. Specific jobs in the community, such as clerical work for a motel, an insurance firm, or a newspaper may be very different from each other in terms of required job tasks. Let's assume, for illustration purposes, that job market analysis has indicated that horticultural training would seem appropriate in terms of the kinds of jobs available in the community. These jobs include plant and gift boutiques, florists, commercial flower greenhouses, a wholesale shrubbery nursery, retail plant nurseries, garden-care firms serving both light industry and suburban homes, and groundskeeper for a local golf course and a city park. Let's further assume that among these alternatives, the city park, the commercial flower greenhouses, and retail nurseries seem to be most interested in trying to work with handicapped students. A careful task analysis of employer

requirements at each job location should identify the extent to which job performance is dependent on intellectual, social, perceptual, gross motor or fine motor skills; the required rates of performance; the tolerance for error allowable; and the level of supervision to be expected. This information is basic to the planning of course content on an individualized basis. Using this information, the vocational educator can guide handicapped students toward those opportunities which seem appropriate in view of their particular physical or mental potential. More to the point, he can design course content for individual handicapped students which takes into account their special needs.

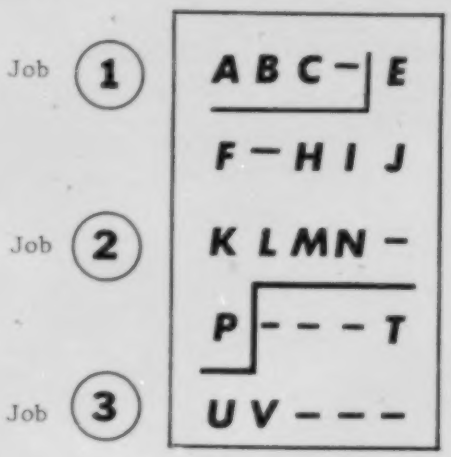
To continue the illustration, based on existing background information it may appear that educable mentally retarded students would be suited for work in city park gardening, which has demands on gross motor skills more than fine motor, and a minimum requirement for intellectual and social skills. However, task analysis of the job reveals that it is also essential that employees in the park gardening crew be able to work with a minimum of supervision. This last factor has definite ramifications for vocational training for it is characteristic of the educable mentally retarded that they depend more heavily on supervisors to tell them what work is to be done and when it has been satisfactorily completed. Put simply, to complement the gardening subject matter it would seem appropriate that the EMR student should be taught how to concentrate on the tasks at hand during the supervisor's absence and how to judge the adequacy of his own gardening work.

Regardless of the foregoing, we have cautioned you against thinking of handicapped persons in stereotyped ways. You can't ignore the possibility that the individual EMR student in your class is at least equal to your nonhandicapped students in terms of being able to work without direct supervision. You need to check it out in a practical, task-oriented way in some of the initial class assignments. If it is confirmed that the individual EMR student does need to learn to work without close supervision, it is a straightforward matter to work out a study plan that builds each desired competency to an acceptable criterion level prior to placing the student in the actual work situation. Here is a diagram summarizing the processes just described in establishing what is to be taught.

Establishing What Is To Be Taught

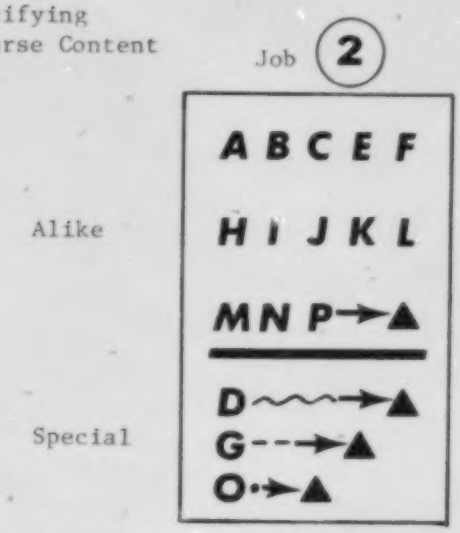
ACTION	CONCEPT	RESULT
1 Job Market Survey		Reveals a cluster of related jobs for which vocational training is appropriate. Several of these are willing to collaborate by accepting trainees.
2 DOT Analysis		Reveals generalizable skills and competencies that are usually associated with jobs of that type.
3 Task Analysis		Reveals varying complexities and specific job/employer requirements; some of which have significance for different types of handicapped persons.

4 Pre-Vocational Evaluation



Assessment of an individual handicapped student reveals high potential for jobs 1 and 2, although there are special training needs in D, G, and O competencies; job 3 does not appear to be feasible at an entry leve.

5 Specifying Course Content



Aiming toward job 2, (a better paying, more desirable job) most competencies can be taught to a criterion level for the handicapped and nonhandicapped. For three targeted competencies, special care is taken to plan course work which will develop each to the fullest potential for the individual. Emphasis is placed on early (in-course) competency assessment of the progress of the handicapped person with appropriate revision of methods and goals.

Deciding Who Is to Teach It

In the preceding graphic representation no distinction was made as to whether the three competencies requiring special attention (D,G,and O) were vocational in nature or were something else altogether. If D was a math competency such as calculating change, G was a social competency such as helping customers, and O was a manual competency such as assembling and operating a rototiller, it isn't too hard to see that the nature of the handicapping condition affects the feasibility of teaching the competency and the possibility that the vocational educator may want to call upon other resource people for teaching the competencies. The table below illustrates the nature of special teaching help that might be selected depending on the type of handicapped student being served and the individual abilities of the student involved.

Handicap	Math Competency Requirement	Social Competency Requirement	Manual Competency Requirement
Communication Impaired (Hard of hearing; speech impaired)	Tutor or buddy system.	Special education teacher or tutor: lipreading and speech production	Classroom aide or buddy buddy system: drills
Educable Mentally Retarded	Special education teacher or math teacher: help in planning money handling drills.	School psychologist: help in planning instruction to improve frustration tolerance in interpersonal situations	Classroom aide: demonstrating in small steps
Vision Impaired	Special education teacher: identification and handling of bills and coins.	Special education teacher: help in personal grooming and modifications of mannerisms.	Occupational therapist or classroom aide (May not be appropriate to train if high risks involved)
Orthopedically Handicapped	Tutor or buddy system	Special education teacher or classroom aide: help in improving poise and self assurance	Occupational therapist or classroom aide (May not be appropriate to train if exceeds strength and maneuverability)

Deciding How It Is To Be Taught

Most vocational educators use a combination of group presentation and one-on-one teaching in their classrooms; however, the trend is clearly toward greater individualization wherever possible. True, group presentations may be efficient for familiarizing students with the classroom environment, the course procedures, and other general topics, but it is quite likely that due to students' different rates of progress or different learning objectives, they will be working on a variety of tasks at the same time.

From a procedural standpoint, individualization of instruction is called for...and lends itself well where specific competencies are to be learned. "Contracts" can be written for each of the competencies, specifying:

- procedures to be followed
- the resources or persons to be involved (including the kinds of help or special assistance available)
- the skills to be demonstrated
- the product to be prepared (if pertinent)
- a goal rate or time (if pertinent)
- general work habits to be exhibited

> A word of advice:
>
> Involve the students in planning of their own "contracts." They will not only become more involved and committed but they will also better appreciate the importance of adding to their competencies and building new skills.

Handicapped students will benefit from contracts that are as nearly like those for nonhandicapped as is possible, though tailored to take into account their particular disability. Remember: Positive reinforcement and a "can-do" philosophy are important here.

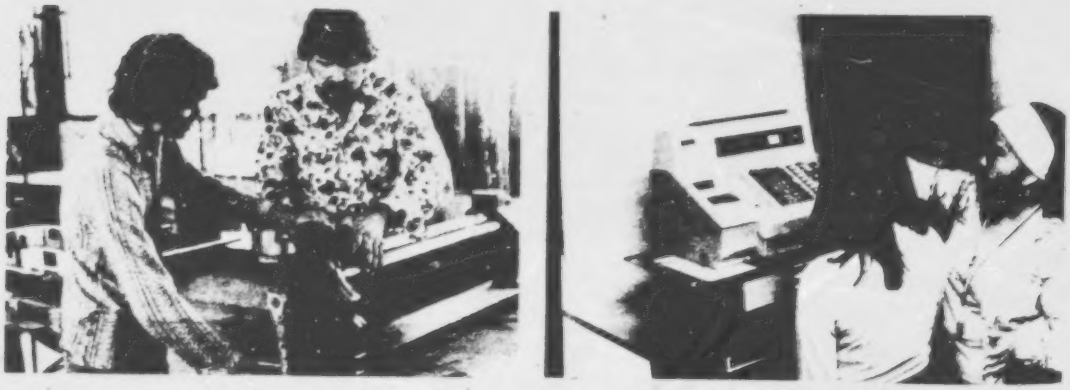
One of the most important "how" questions for the handicapped is whether the communication methods and media are appropriate or inappropriate for the individual involved. Common sense can guide you in most decisions about the best way to present material so that the handicapped and nonhandicapped can both benefit. This common sense approach holds true regardless of the occupational area being taught, the complexity of the task at hand, and whether instruction is dependent on technological aids or on human interaction. The six photographs on the following page illustrate

- (top row)- direct hands-on assistance and demonstration by instructors when the operation of equipment is being taught to the handicapped
- (middle row)- the use of simple techniques to overcome a disability such as how to cut a straight line without being able to see it, and the application of safety precautions that take the type of handicap into account
- (bottom row)- the use of special-purpose equipment that is designed specifically for handicapped persons, enabling them to study on an individual basis, and the pairing up of handicapped and nonhandicapped students to facilitate learning and increase social skills

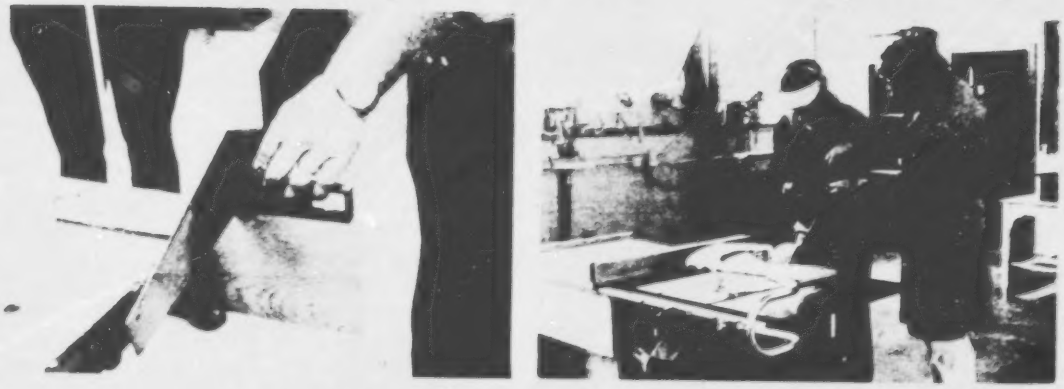
Deciding Where It Is To Be Taught

There is little question that instruction in the school will take place in the room normally assigned for the purpose, regardless of whether a handicapped person is in the class. Within the classroom, however, some flexibility may be possible. Environmental adjustment to benefit the handicapped include such considerations as

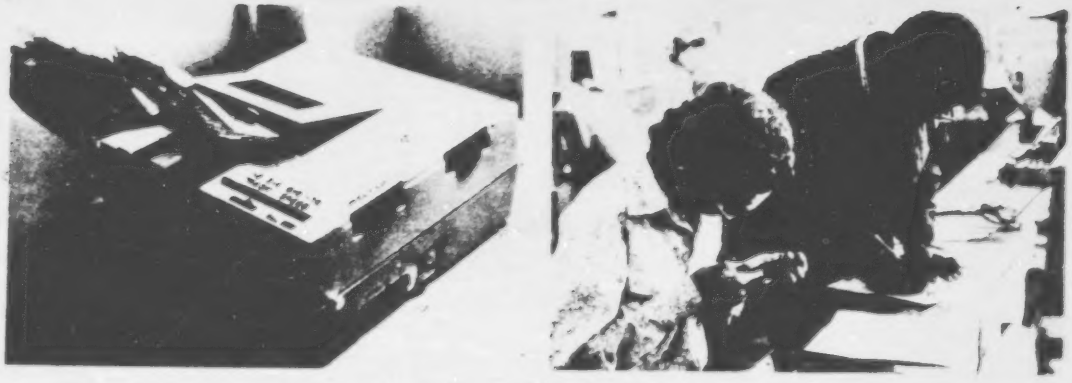
- seating that assures the best lighting, viewing angle, listening, and includes the handicapped person in the thick of the action
- relocating any movable obstacles (wires crossing aisles, etc.) that could be hazardous to the blind, and similarly reevaluating safety precautions (guards, etc.) on power equipment
- altering the design or location of work stations to make surfaces and tools reachable for the orthopedically handicapped



Instruction in Industrial and Office Occupations



Instruction in Simple and Complex Procedures



Alternatives of Instructional Strategy

Deciding where the handicapped person should be placed for work experience involves similar considerations, though the opportunity to alter the environment to accommodate the handicapped student is diminished by practical limitations. Understandably, employers have a certain amount of reluctance to cooperate in a work experience program if the student involved clearly can't function in the environment and alterations would be required. Common sense again comes into play. Select a work experience location that is fair to the handicapped student in terms of the inconveniences or problems to be faced. Although you may request a few adjustments, don't expect major concessions from the cooperating employer.

Perhaps as important as the physical situation itself are questions of access to the work experience location. Can the handicapped student get transportation to and from his work without aid? Is a closer, more convenient, but equally worthwhile location available? What arrangements can be made using vocational education set-aside funds, special education funds, or vocational rehabilitation assistance to provide transportation for the student?

Deciding Whether It Has Been Taught

Assessment of student competencies is a natural and necessary part of the instructional process. Just as the student was assessed before instruction to identify his strengths and weaknesses, it is important to make another assessment after instruction to see what growth has taken place. Each student, whether handicapped or not, can be expected to progress at different rates and in different ways. To the extent that instruction has been individualized, with an emphasis on specific goals toward which the student works, the development of skills should be readily observable.

Earlier, we pointed out that handicapped students can be helped to develop in a number of ways...not only in the acquisition of vocational skills but also in essential living skills of a personal and social na-

ture. We further indicated that their gains might seem small (by comparison to the nonhandicapped) but nevertheless could be quite significant advances for the individual involved. The important point is that some kind of progress should be evident which can be built on in the future.

Let's review for a moment. To train the handicapped student for competitive employment you will need to

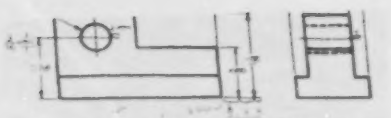
- establish realistic goals for each individual based on preliminary assessment and personal characteristics
- cooperatively plan appropriate learning activities and indicate expected outcomes of training
- structure the training environment to support the necessary instruction
- make adequate provision of human resources to implement instruction
- assess student readiness for work experience and performance on the job

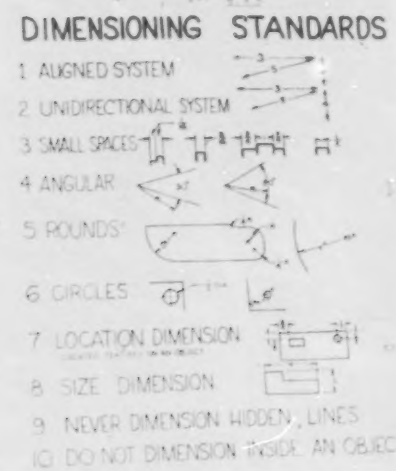
What additional activities mentioned in this section do you feel are particularly important to a well-balanced vocational training program for handicapped persons?

On the following pages are seven illustrations of components of effective instruction. Review them, and then think of other important components that have been discussed already but are not included in the illustrations.

1. Developing Student Awareness

2. Relating Course Content to Available Job

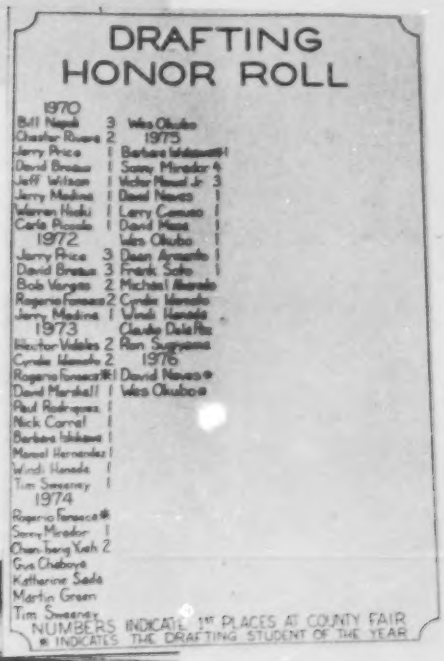




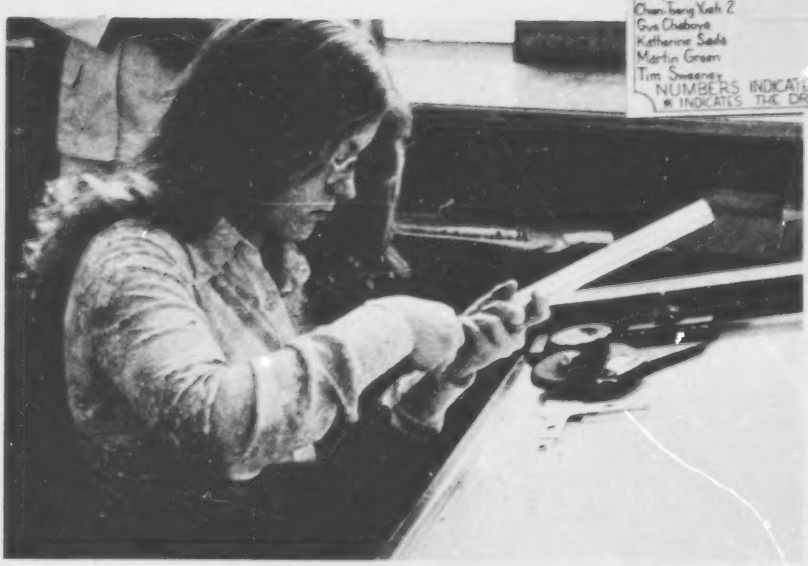
3. Preparing Appropriate Instructional Materials and Job Aids

4. Shaping the Training Environment for Effective Communication

5. Establishing Reasonable Goals that Reflect Individual Differences



6. Providing Positive Reinforcement and Acknowledging Accomplishments



7. Assessing Performance Skills for Appropriate Work Experience or Job Placement

Evaluation of Instructional Outcomes

Evaluation of the outcomes of instruction is necessary for many reasons but principally because a) it can document compliance with the law, b) it can justify the worthwhileness of the expenditures of accomplishing the instruction, and c) it can provide objective, useful information for future action by the vocational educator, the handicapped individual (and concerned others), and the employer.

Compliance with the Law

At the outset of this module we pointed out that the handicapped are legally and ethically entitled to vocational services on an equitable basis. Systematic procedures for program evaluation and reporting are built into the state plan for Vocational Education, and for Special Education as well, and in turn, much of this information is made available to federal offices. Each vocational educator is accustomed to keeping records that show the extent of services delivered, the nature of the student population served, and similar information. We will not expand on them here except to say that in successive years these statistics should reveal a definite upward trend in

- the proportion and variety of handicapped students that are being successfully "mainstreamed" into regular vocational classes
- the variety of occupational areas in which handicapped students are receiving career exploration and job relevant training
- the placement and successful job performance of handicapped students in local business and industry.

Worthwhileness of Expenditures

It is often stated, but not as often proved, that "you get what you pay for." To the extent that funds <u>are</u> available for hiring instructional aides, making minor facilities renovations, providing transportation that <u>some</u> (not all) handicapped students need, it seems reasonable to justify their use. There is no widely accepted procedure for doing this cost-benefit analysis at the local level, and it is not the kind of thing the vocational educator will do in any elaborate way. Nevertheless, judicious

self-appraisal by the Vocational Advisory Committee, the Educational Planning Committee, the Learning Support Team and the vocational educator should be focused on whether

- the use of special funds enabled the fulfillment of particular student-centered program objectives
- the scope of instruction and quality of learning were enhanced through the use of the special funds
- the funds are being applied in the most meaningful way, yielding substantial and long-term positive effects.

Information for Future Action

When information is acquired for the purpose of improving future action, it is sometimes referred to as process evaluation. It is here that the vocational educator's close observation and assessment of student performance is vital.

As a professional, he will recognize the need to accumulate and interpret information that will

- allow a personal appraisal of his own knowledge about the handicapped, his attitudes toward them, and his professional strengths and weaknesses in dealing with them
- suggest improvements in course content, teaching techniques, assessment procedures, use of resource personnel, or other modifications of the instructional environement so as to better serve the handicapped.

The handicapped individual obviously has a vested interest in knowing how he or she has improved and what has been achieved. Again, these outcomes can be vocational in nature or can be related to more general living skills. In brief, the vocational educator's evaluation should reflect the extent to which

- academic skills were improved, particularly in applied reading and math
- communication skills were improved, particularly in listening and speaking in work relevant situations
- self reliance was gained, particularly in self-care, environmental awareness, and mobility

- self-esteem was developed, particularly in personal dignity and constructive new potential realized
- career goals had been advanced, particularly in aspirations reached and new interests developed.

Finally, the employer has criteria that are important to him in the selection and retention of employees. Accordingly, the vocational educator's evaluation of each handicapped student should reveal

- the extent of job knowledge exhibited (familiarity with job elements, terminology, etc.)
- the level of skill reached in job operations (clerical, manual competencies, etc.)
- the appropriateness of work habits (punctuality, reliability, etc.)
- the ability to relate to others (co-workers, the public, etc.)
- the attitude toward the job (willingness to learn, follow directions, etc.)

Numerous other job-relevant dimensions have been identified as important for occupational survival in a recent study reported by O'Neil (1976). In this study some 300 persons helped to refine a tentative list of 500 occupational "survival skills" to 27 basic categories. A representative sample of 589 workers then judged their relative importance. Five extremely important qualities emerged. They were

- being dependable
- giving an honest day's work
- knowing what is expected of you
- maintaining good health
- managing time and materials efficiently

It's interesting, isn't it, that qualities such as these apply to vocational educators as much as they do to newly trained handicapped and nonhandicapped persons entering the job market for the first time.

A challenge: Evaluation is likely to be ignored or ineffective if it is overly tedious to carry out or too complex in nature. How, then, might you devise a simple system of record-keeping to collect the kinds of information needed for future action by yourself, the handicapped person, and by the employer?

Throughout this module you were challenged with a number of questions designed to stimulate your thinking and cause you to reflect on the material presented. Hopefully, you could answer most of those questions to your own satisfaction or you reread the related material to improve your understanding.

As you continue in this module you will find a Resource Section to guide you toward further reading and help to identify key persons or organizations. The Assessment Section which follows is designed to evaluate your general understanding of factors involved in serving the handicapped through regular vocational education classes. If you don't have all the answers after reading this module don't be dismayed...experience is the best teacher, and teaching the handicapped is a most gratifying experience.

Good Luck and Good Teaching!

For further study, it is recommended that you read the module Developing a Positive Attitude, followed by the specific module or modules which relate to the kind(s) of handicapped students you expect to have in your classes. The choices are: 1) Serving the Mentally Retarded, 2) Serving the Orthopedically Handicapped, 3) Serving the Visually Handicapped, 4) Serving the Communication Impaired. Then, to apply the information you have gained, it would be appropriate to complete the practicum module entitled Developing a Plan of Action.

REFERENCES

Brolin, Donn. Vocational preparation of retarded citizens. Columbus, Ohio: Charles E. Merrill, 1976.

California State Department of Education. California master plan for special education. Sacramento: California State Department of Education, 1974.

California State Department of Education. California state plan for vocational education. Part I: Administrative provisions. Sacramento: California State Department of Education, 1976.

O'Neil, Sharon L. Occupational survival skills: Implications for job maintenance and mobility. Urbana-Champaign, Illinois: Department of Vocational and Technical Education, University of Illinois, 1976.

State of California. Education Code: Volume I. Sacramento: Office of State Printing, 1968.

U. S. Department of Labor. Dictionary of occupational titles. Washington: U. S. Government Printing Office, 1965.

Urban Management Consultants. Vocational rehabilitation and CETA. A coordination guide for vocational rehabilitation administrators. Washington: U. S. Department of Health, Education, and Welfare, 1976.

Urban, S. G., and Tsuji, T. (Eds.). Marland on Career Education. In The special needs student in special education: Selected readings. New York: MSS Information Corporation, 1974.

Resource Section

This section is intended to provide suggestions for those vocational educators who would like to learn more about the handicapped, and leads for those who are seeking resources to help them in serving the handicapped. It includes:

I. Bibliographic Resources
   - A. Further study on the handicapped
   - B. Selected listing of published materials and resources
     1. General
     2. Orthopedically handicapped
     3. Visually impaired
     4. Communication impaired
     5. Mentally retarded
   - C. Legislation, Regulations, and Guidelines

II. Agencies and Service Groups Providing Services to the Handicapped
   - A. State of California
   - B. Federal Offices and Agencies
   - C. Private and Non-profit agencies and organizations

I. Bibliographic Resources

A. Further Study on the Handicapped

Edgerton, Robert The cloak of competence. Berkeley: University Press, 1967.

This book deals with the importance of the post-school or post-training period in the career development of retarded persons. In particular, it reveals the occupational problems of persons who have been classified as "mentally retarded" at some time in their life.

Farber, B. Mental retardation: Its social context and social consequences. Boston: Houghton Mifflin, 1968.

This book deals with mental deficiency in a social context, emphasizing the role of society in perpetuating the dependency and failure of individuals categorized as "retarded."

Gardner, W. I. Behavior modification in mental retardation. Chicago: Aldine-Atherton, 1971.

Outlines basic concepts used in changing behavior in a positive way to increase skills acquisition and employability.

Hanninen, K. A. Teaching the visually handicapped. Columbus, Ohio: Charles E. Merrill Publishing Co., 1975.

A basic textbook on methods of teaching the visually impaired. Particular emphasis on methods and materials which are useful with the visually handicapped in regular classes.

Love, Don. Vocational education and the physically handicapped: Voices and views. South Pasadena, California: Hoskins and Associates, 1971.

An effort toward recognizing the problems and possibilities inherent in introducing handicapped students into the regular school environment. Although it deals specifically with the community college, this publication represents a comprehensive approach to integrating the handicapped in programs.

Love, Harold D. Educating exceptional children in regular classrooms. Springfield, Illinois: Charles C. Thomas, 1972.

Examines present policies and practices in serving handicapped students in regular classes. Each handicapped group is treated separately, with particular problems and solutions discussed.

Kirk, Samuel A. Educating exceptional children. Boston: Houghton Mifflin Company, 1972.

An excellent basic resource in the field of special education. Provides an integrated and unified approach to understanding various handicapping conditions.

Kolstoe, O. P. Teaching educable mentally retarded children. New York: Holt, Rinehart, and Winston, 1970.

A basic text in planning and carrying out an instructional program for mentally retarded students.

Lowenfeld, Berthold, (Ed.). The visually handicapped child in school. New York: John Day Company, 1973.

Excellent publication dealing with diagnosis, educational methodology, and social adjustment of the visually impaired.

Nelson, Hilding E. Serving students with special needs in vocational education. Gilman Hot Spring, California: Mt. San Jacinto College, 1971. (filmstrips and cassette)

A multiunit series, this presentation consists of audiovisual packages with printed instruction guides and worksheets. Units in the series deal with different handicapping conditions and may be ordered separately. All are excellent sources of information for the vocational educator.

Northcott, W. H. (Ed.). The hearing impaired child in a regular classroom: Preschool, elementary, and secondary years. Washington: The Alexander Graham Bell Association for the Deaf, Inc. 1973.

A book for parents and educators. Provides guidelines for the entry of hearing-impaired students into the regular class. Audiological and environmental factors and curriculum modification are discussed.

Prime Study Group III, Eleventh Institute on Rehabilitation Services. Services to the blind: A community concern. Washington, D.C., U. S. Department of Health, Education, and Welfare, DHEW Publication No. (SRS) 73-25077, 1973.

Report on delivery of rehabilitation services to the visually handicapped. Special emphasis on occupational information and job development.

Russell, Gene H. A five-county vocational skills training program for the blind: Project document. Santa Cruz, California: The Santa Cruz Office of Education, 1972.

A three-year project designed to provide vocational training to visually impaired students in a five-county area, provide inservice training to regular vocational educators working with blind students, and develop guidelines for organizing and implementing such a program.

Stewart, Larry G. (Ed.). Perspectives in education of the deaf. Proceedings of National Forum V. Council of Organizations Serving the Deaf. Washington: Rehabilitation Services Administration, 1972.

This publication provides an overview of concerns and issues facing educators of the deaf. The Forum meets annually and concentrates on topics of current interest in order to explore courses of action in given areas.

Tindall, Fitzsimmons, Lambert, Davis, and Gugerty. It's about time (various disabilities) came out into the open. Madison, Wisc.: University of Wisconsin, 1976.

A series of six pamphlets (alcohol, drug, emotional, hearing, physical, visual) designed to bring information on handicapped conditions to vocational educators and others.

B. Selected Listings of Published Materials and Resources

1. General

Annotated bibliography and abstracts on the vocationally handicapped. Conrad, L. R. Washington: Bureau of Education for the Handicapped, U. S. Office of Education, 1972.

Excellent source of information on vocational education and vocational rehabilitation literature. Available from the California Area Learning Resource Center, 600 Commonwealth Avenue, Suite 1304, Los Angeles, CA, 90005.

A bibliography of materials for handicapped and special education. Lambert, R. H. Center for Studies in Vocational and Technical Education, University of Wisconsin-Madison, 1975.

An extensive listing of vocational education resource materials for use in programs serving the handicapped. Can be obtained from: Center for Studies in Vocation and Technical Education, 321 Education Bldg., 1000 Bascom Mall, Madison, WI, 53706.

Catalog of instructional materials for the handicapped. Clearinghouse Depository for Handicapped Students. Sacramento, California: California State Department of Education, 1972.

Provides free instructional materials for handicapped students.

Directory: Sources for Handicapped Job Applicants. The California Governor's Committee for Employment of the Handicapped. Sacramento: State of California Employment Development Department, 1976.

A source book prepared for employers seeking to hire the handicapped. This 80-page publication lists the principal rehabilitation and training agencies within the state. State, regional, and local contacts are listed for the Employment Development Department, Department of Rehabilitation, public and private rehabilitation facilities, Regional Occupational Programs, community colleges, and state colleges and the University of California. The Directory includes a brief description of each type of recruitment source and the services it offers to applicants and employers.

Dictionary of occupational titles. U. S. Department of Labor. Washington: U. S. Government Printing Office, 1965.

Comprehensive listing of job titles according to occupational area. Each job type is classified according to 1) work performed, 2) worker requirements, 3) pertinent qualifications, 4) training and methods of job entry, 5) related classifications.

Federal assistance for programs serving the handicapped. Washington: Clearinghouse of the Office for Handicapped Individuals. DHEW Pu. No. (OHD) 76-220001, 1975.

A comprehensive listing and description of federal programs and activities which provide assistance to the handicapped and those working on their behalf.

Improving occupational programs for the handicapped. Parker, S. L., Taylor, G. M., Hartman, W. T., Wong, R. D., Grigg, D. A., and Shay, D. E. (OEC-0-72-5226) Washington: U. S. Department of Health, Education, and Welfare, 1972.

Describes methods and programs in actual practice throughout the country. Provides practical information, program abstracts and evaluation checklists.

Mainstreaming: Helping teachers meet the challenge. National Advisory Council on Education Professions Development. Washington: U. S. Department of Health, Education, and Welfare, 1976.

This publication defines "mainstreaming" and discusses its implication for both students and teachers.

Regional occupational centers and programs directory, 1975-76. Sacramento: California State Department of Education, 1975.

Listing of the 65 regional occupational programs which provide vocational and technical training for high school students, out-of-school youth, and adults in California.

Resource Guide. Mainstreaming: The integration of children with special needs into a regular classroom environment. Redwood City, California: San Mateo County Office of Education, 1975.

A bibliography of publications on mainstreaming available from the San Mateo Educational Resources Center.

Selected Career Education Programs for the Handicapped. U. S. Department of Health, Education, and Welfare. DHEW (OE) 73-05501 Washington: U. S. Government Printing Office, 1973.

Provides information about various programs being conducted in vocational preparation of the handicapped. Covers a broad range of vocational areas and widely differing handicapping conditions. Lists sources of additional information.

Services for special needs. Bell Telephone System.

Explains special equipment available for persons with communication, visual, or motion impairments. Available on request from your local Bell Telephone business office.

The Governor's Committee for Employment of the Handicapped: Organizational Handbook. The California Governor's Committee for Employment of the Handicapped. Sacramento: State of California Employment Development Department, 1974.

An information publication which details the goals, organization, and functions of this important task force. Includes a directory of local committees for Employment of the Handicapped.

Vocational tests and reviews. Buros, Oscar Krisen (Ed.). Highland Park, New Jersey: The Gryphon Press, 1975

Consists of the business education, multi-aptitutde and vocations sections of the 7 Mental Measurements Yearbooks (1938-72) and Tests in Print II (December 1974).

2. Orthopedically Handicapped

Into the mainstream. A syllabus for a barrier-free environment. Washington: Rehabilitation Services Administration (DHEW), 1975. ED 112 492

This publication contains practical information necessary to plan a barrier-free environment. Excellent source of information on published sources of information and concerned groups.

Architectural planning for the physically handicapped.

Brief checklist of recent publications compiled by the National Easter Seal Society. Single copies available free of charge from this organization.

Handbook for handicapped. Louise Friderici (Ed.). Tampa: University of South Florida. n.d.

A guide to serving handicapped students, this publication contains information about the opportunities and barriers that a handicapped student may encounter on campus. May be ordered from: Advisor to Handicapped Students, CTR 217, University of South Florida, Tampa, Florida, 33620 (No charge to date.)

American National Standard ANSI. American National Standards Institute. Chicago: National Easter Seal Society for Crippled Children and Adults, 1961.

Contains specifications for making buildings and facilities accessible to the handicapped. Single copies available free from National Easter Seal Society.

Bio-engineering services to the developmentally disabled adolescent, Final Report. Washington: George Washington University, Job Development Laboratory, 1975, ED113 892.

A one-year demonstration project designed to increase the educational and vocational potential for 24 students with severe physical limitations. Contains descriptions and illustrations of adaptive devices for use by the physically handicapped.

Accessibility modifications: Guidelines for modifications to existing buildings for accessibility to the handicapped. Ronald Mace. North Carolina Department of Insurance: Special Office for the Handicapped, 1976.

This 63-page document gives illustrations and specifications for a wide variety of applications, such as elevator button heights and rest room stalls. It also suggests problem solving approaches.

3. Visually Impaired

Aids and appliances for the blind and visually impaired. New York: American Foundation for the Blind, Inc., 1976.

This 32-page catalog lists over 300 items specialized for use by the visually handicapped. Available at no charge from AFB, the catalog also contains a listing of other suppliers of aids and appliances for the blind and visually impaired.

Educational aids for visually handicapped. Davis, F. E., and Lappin, C. W. Instructional Materials Reference Center for Visually Handicapped Children. Louisville, Kentucky: American Printing House for the Blind, 1971, 2nd edition.

A catalog of sources of educational materials and aids for the visually handicapped. Contains a section on vocational education materials.

International Catalog: Aids and appliances for blind and visually impaired persons. Clark, L. L. (Ed.). New York: American Foundation for the Blind, Inc., 1973.

This publication lists distributors of appliances and aids for the visually impaired. In addition, to a section on vocational aids, the catalog contains sections on low vision aids and money handling and telephone aids.

A list of California transcribers. Sacramento, California: Clearinghouse Depository for the Visually Handicapped, California State Department of Education, 1976.

A directory of volunteer transcriber groups engaged in the transcription of print materials into braille. Copies are free to schools.

Measures of psychological, vocational, and educational functioning in the blind and visually handicapped. Scholl, G. S. and Schnur, R. New York: American Foundation for the Blind, 1976.

Listing of available tests which are considered appropriate for assessing persons with visual impairments. Contains a section on vocationally-oriented measures.

Volunteers who produce books: Braille large type, tape. Washington: Library of Congress Division for the Blind and Visually Handicapped, 1973.

Listing of services provided to the handicapped by the Volunteer Services Section of the Library of Congress. Also lists regional centers by state.

4. Communication Impaired

Directory of programs and services for the deaf in the United States. American Annals of the Deaf, Vol. 121, No. 2, April 1976.

Comprehensive listing of agencies and associations serving the deaf in the United States.

Report of the Study Committee on statewide planning for the deaf and severely hard of hearing in California public schools. California State Department of Education. Sacramento: California State Department of Education, 1970.

A study to determine ways in which existing programs might be strengthened and improved. Contains a section on vocational-technical programs.

Signing exact English: Seeing instead of hearing. Gustason, G., Pfetzing, D., and Sawolkow, E., Silver Spring, Maryland: Modern Signs Press, 1972.

An illustrated manual of American Sign Language used by the deaf. Of practical value to the vocational educator who wishes to learn fingerspelling and/or some occupationally relevant signed concepts.

Special language programming for exceptional children with language disorders. California State Department of Education, Sacramento: California State Department of Education, 1971.

Proceedings of a Special Study Institute focusing on the educational needs of students with language disabilities.

5. Mentally Retarded

Guide to jobs for the mentally retarded. Peterson, R. and Jones, E. M., Pittsburgh: American Institutes for Research, 1964.

Suggests placement strategies and jobs for the mentally retarded in various occupational areas.

Preparing for work. Fraenkel, W. A. Washington: The President's Committee on Employment of the Handicapped, n.d.

Contains useful tips on job training and placement. Lists locational areas and specific jobs that have proven feasible for the retarded.

A prevocational and social adjustment program for educable retarded adolescents. Beedy, V. Milwaukee: University of Wisconsin, 1971 (ERR) ED 046 041

This program was developed to improve the prevocational competencies of retarded students in educational, social, and vocational areas. Description of activities, vocational, educational adjustment techniques, and parent participation are included.

Programs for the educable mentally retarded in California public schools. Hanson, F. M. and Shryock, C. Sacramento: California State Department of Education, 1974.

Provides information on planning, managing, and evaluating programs for the educable mentally retarded. A concise summary of state legal provisions, student characteristics, instructional considerations, and guidelines for evaluation. Annotated bibliography is included.

Work-study handbook for educable mentally retarded minors enrolled in high school programs in California public schools. Campbell, L. W., Todd, M., and O'Rourke, E. V. Division of Special Education, California State Department of Education. Sacramento, 1971.

Manual for planning and implementing secondary level programs of academic preparation and skill training for the educable mentally retarded.

Work-study programs for slow learning children. Cross, J. and Crawford, W. Columbus, Ohio: Ohio State Dept. of Education, 1967.

Discusses the development of integrated academics and career education programs for the mentally handicapped.

Vocational preparation of r tarded citizens. Brolin, D. E. Columbus, Ohio: Charles E. Merrill Publishing Co., 1976.

An excellent resource, this book presents a comprehensive "how to" approach to vocational training for the retarded.

C. Legislation, Regulations, and Guidelines

California master plan for special education. California State Board of Education. Sacramento: California State Department of Education, 1974.

> Adopted in 1974, the Master Plan provides guidelines for a program of quality education for all handicapped students.

California state plan for vocational education: Part I- Administration Provisions. Sacramento: California State Department of Education, 1976.

> Based on guidelines mandated by the U.S. Office of Education, and recommendations of the California Advisory Council on Vocational Education and Technical Training, this document is a policy and procedure guide for programs which qualify for financial support under the Vocational Education Amendments of 1968.

Vocational rehabilitation and CETA: A coordination guide for vocational rehabilitation administration. Urban Management Consultants of San Francisco, Inc. Washington: U. S. Department of Health, Education, and Welfare, 1976.

> Provides information about the Comprehensive Employment and Training Act (CETA) and points out areas for coordination with local vocational rehabilitation agencies.

Public policy and the education of exceptional children. Weintraub, F., Abeson, A., Ballard, J., LaVor, M., (Eds.). Reston, Virginia: The Council for Exceptional Children, 1976

> Excellent collection of information on current legislation and public policy affecting exceptional children.

Vocational education for handicapped persons: Handbook for program implementation. (OE 35096) Young, E., Stevens, G., and O'Neal, L. U. S. Office of Education. Washington: U. S. Government Printing Office, 1970.

> Contains information for those responsible for local program development and implementation.

II. Agencies and Service Groups Providing Services to the Handicapped

A. State of California

California State Department of Education

Office of Vocational Education
721 Capitol Mall
Sacramento, CA 95814
Samuel Barrett, Director

Office of Special Education
721 Capitol Mall
Sacramento, CA 95814
Les Brinegar, Asst. Superintendent and Director

The Clearinghouse Depository for the Handicapped Student
721 Capitol Mall
Sacramento, CA 95814

An office which offers assistance in the procurement of specialized instructional materials and equipment for handicapped students. Provides consultant services for programs involving specialized use of media for instructional purposes.

Comprehensive Employment Training Act (CETA)
50 Fulton Street, Rm. 445
San Francisco, CA 94102
Howard Williams, Regional Manpower Coordinator

The purpose of CETA is to provide job training and employment opportunities for underemployed persons through a flexible and decentralized system of federal, state and local programs.

Office for Handicapped Individuals (in HEW)
50 Fulton Street
San Francisco, CA 94102
Martha Hislop, Regional Coordinator

Serves as the regional focal point, within the federal Office of Human Development, for program coordination and planning relevant to the physically and mentally handicapped.

California Area Learning Resource Center
600 S. Commonwealth Avenue, Suite 1304
Los Angeles, CA 90005

California area distribution center for specialized learning materials for handicapped students. Operates in cooperation with the National Center for Educational Media and Materials for the Handicapped (NCEMMH).

Below is a list of associate centers affiliated with the California Learning Resource Center, all of which circulate materials for handicapped students.

1. Anaheim City Schools
2. Placer County Office of Education, Auburn
3. Kern County Supt. of Schools, Bakersfield
4. San Juan Unified School District, Carmichael
5. Special Education Development Program, Chico
6. Contra Costa County, Concord
7. Imperial County Supt. of Schools, El Centro
8. Center for Exceptional Children, Eureka
9. Fountain Valley Elementary, Fountain Valley
10. School of Education/CSU-Fresno
11. Devereaux Schools in California, Goleta
12. Stanislaus County Dept. of Education, Modesto
13. Lancaster School District
14. Office of Supt. of Schools, Napa
15. Newport-Mesa Unified School District, Newport
16. Instructional Materials Lab. CSU-Northridge
17. Orange Unified School District
18. Placentia Unified School District
19. Tehama County Dept. of Special Education, Red Bluff
20. Shasta County School Office, Redding
21. Rowland Unified School District, Rowland Heights
22. Sacramento City Unified School District
23. Sacramento County Office
24. Department of Education, Sacramento
25. Scholarship and Special Instructional Programs, Sacramento
26. Office of County Supt. of Schools, San Bernardino
27. Department of Special Education CSU-San Diego
28. Teacher Learning Center, San Francisco
29. Office of Education, San Jose
30. San Luis Obispo County Schools
31. Santa Barbara County Schools
32. Special Education, Santa Barbara
33. Sonoma County Office of Education, Santa Rosa
34. Lassen County School District, Susanville
35. Torrance Unified School District
36. Ventura Unified School District
37. Visalia School District

California State Department of Rehabilitation
830 K Street Mall
Sacramento, CA 95814
Edward V. Roberts, Director

Responsible, at the state level, for state-federal programs of vocational rehabilitation for the disabled. The disabled include persons handicapped by mental or physical illness or impairment. The primary objective of this agency is to prepare disabled persons for gainful employment. Under federal sponsorship, the State Department of Rehabilitation supports research and demonstration projects, training qualified personnel, and facilities construction and improvement.

District Offices

Chico District Office
Service Area: Colusa, Glenn, Butte, Siskiyou Modoc, Shasta, Lassen, Tehama, Trinity, Yolo, Yuba, Plumas, Sutter, Sierra, Nevada

Sacramento District
Sacramento, Placer, El Dorado, Alpine

Santa Rosa District
Del Norte, Humbolt, Lake, Mendocino, Napa Solano, Sonoma

Oakland District
Alameda

San Francisco District
San Francisco

Pleasant Hill District
Contra Costa, Marin

San Jose District
Santa Clara

Redwood City District
San Mateo

Stockton District
Amador, Calaveras, San Joaquin, Stanislaus, Tuolumne

Riverside District
Riverside, Imperial

San Bernadino District
Inyo, San Bernadino

Fresno District
Merced, Mariposa, Madera, Fresno

Bakersfield District
Kern, Kings, Tulare

Salinas District
Monterey, Santa Cruz, San Benito

Santa Barbara District
San Luis Obispo, Santa Barbara

Long Beach District
South Los Angeles

San Diego District
San Diego

Downtown Los Angeles District
Los Angeles

East Los Angeles District
East Los Angeles

Van Nuys District
Northwest Los Angeles

Inglewood District
West Los Angeles

Anaheim District
Orange

Los Angeles Mid-Cities District
South Central Los Angeles

Norwalk District
Los Angeles

Covina District
Los Angeles

Pasadena District
Northeast Los Angeles

The Governor's Committee for Employment of the Handicapped
State of California
Employment Development Department
800 Capitol Mall
Sacramento, California 95814

At the state level, the Governor's Committee for Employment of the Handicapped forms a link between the President's Committee and local Committees within the State of California. The primary goal of the Governor's Committee is to create a climate of equal employment opportunity for handicapped persons. Through local organizations, the committee seeks to develop job information, educate the public concerning job needs and abilities of persons with handicaps, assist agencies concerned with employment of the handicapped, and works toward eliminating architectural barriers which limit the employment opportunities of the physically limited.

Publications are available from the Governor's Committee on affirmative action, hiring the handicapped, disabilities in employment, architectural barriers, employment guides for the handicapped person, demographic and statistical information, and a variety of relevant guides, handbooks, and periodicals. Films are also available.

Listings of these materials can be obtained by writing to California Governor's Committee for the Employment of the Handicapped, 800 Capitol Mall, MIC 37, Sacramento, California, 95814, or by calling (916) 445-0676.

B. Federal Offices and Agencies

Office of Education

A branch of the Department of Health, Education, and Welfare, the Office of Education aids state and local educational agencies in the establishment and maintenance of school systems. This office is responsible for Federal financial assistance to local agencies for special studies and programs, and gathers and disseminates information on the condition and progress of education in the United States.

Bureau of Occupational and Adult Education

National Advisory Council on Vocational Education

Division of Vocational and Technical Education

Comprehensive Employment Training Act

Bureau of Education for the Handicapped

National Advisory Committee on the Handicapped

Office of Human Development

Focuses resources within the Department of Health, Education, and Welfare on serving groups with special needs: children and youth, the aged, the handicapped, native Americans, and people living in rural areas. This office is responsible for effective policy development and for program management at the federal level.

President's Committee on Employment of the Handicapped

Committee for Barrier-Free Design

Office for Handicapped Individuals

Rehabilitation Services Administration

Office of Developmental Disabilities

Architectual and Transportation Barriers Compliance Board

Library of Congress
Division for the Blind and
Physically Handicapped
Washington, D.C. 20542

Maintains regional centers which produce books (for the handicapped in braille, large print, and on tape.) Centers maintain a library of of transcribed materials, and are able to produce materials on reguest to meet special and individual needs.

National Center on Educational Media and
Materials for the Handicapped
The Ohio State University
220 W. 12th Ave.
Columbus, Ohio 43210

This agency provides a comprehensive national program of activities to facilitate the use of educational technology in instructional programs for the handicapped. Free services are provided in cooperation with Area Learning Centers, Specialized Offices, and various public and private agencies.

Special Office for the Visually Impaired
American Printing House for the Blind
1839 Frankfort Ave.
Louisville, KY 40206

Specialized Office for the Deaf and Hard of Hearing
University of Nebraska-Lincoln
175 Nebraska Hall
Lincoln, Nebraska 68508

Specialized Office for Other Handicaps
467 Wisconsin Research and Development
Center for Cognitive Learning
1025 West Johnson Street
Madison, Wisconsin 53706

Special Office for Materials Distribution
Indiana University
Audiovisual Center
Bloomington, Indiana 47401

President's Committee on Employment
of the Handicapped
1111 20th St. N.W.
Washington, D.C. 20210

Facilitates the development of maximum employment opportunities for the handicapped.

President's Committee on Mental Retardation
Washington, D.C. 20201

Comprised of the secretary of Health, Education, and Welfare, the Secretary of Labor, the Director of the Office of Economic, and 21 citizens, this group works to promote awareness of the needs of the mentally retarded. Coordinates services of concerned agencies and sponsors workshops and forums. Also serves as advisory body to the President.

U.S. Office of Education
Bureau of Education for the Handicapped
Division of Media Services

1) Captioned Films and Telecommunications Branch (CFT)
Provides free loan service of captioned educational films.

2) Learning Resources Branch
Provides full spectrum of services to deaf students, including development of needed instructional materials and delivery of appropriate support services.

C. Private and Non-profit Agencies and Organizations

Alexander Graham Bell Association
for the Deaf
3417 Volta Place N.W.
Washington, D.C. 20007

Organization of professional workers and others interested in research and training for the deaf. Serves as an information center on speech and hearing problems.

American Assocation on Mental Deficiency
5215 Connecticut Ave., N.W.
Washington, D.C. 20015

Organization of professional workers, students, and others interested in the study, treatment, and prevention of mental retardation.

American Foundation for the Blind
15 West 16th Street
New York, NY 10011

National research and information agency which coordinates local and regional agencies serving the blind. Maintains library services for the blind. Develops and manufactures books and special aids for the visually handicapped.

American Speech and Hearing Association
9030 Old Georgetown Road
Bethesda, MD 20014

Professional association of specialists in speech pathology and audiology.

The Arthritis Foundation
1212 Avenue of the America
New York, NY 10036

An organization whose primary purposes include research, treatment, training for professionals, and public education about arthritis.

Braille Institute of America
741 North Vermont
Los Angeles, CA

This organization is concerned with job development and placement for blind persons.

The Council for Exceptional Children
1920 Association Drive
Reston, VA 22091

The CEC serves as a primary resource center, providing information, training workshops, and special assistance to those working with handicapped students.

CEC Information Center on Exceptional Children
1920 Association Drive
Reston, VA 22091

The center maintains and distributes materials of interest to those working with the handicapped. These include publications and audio-visual materials for teachers, administrators, and other concerned professionals. Toll Free Hotline 800/336-3728

Goodwill Industries of America
9200 Wisconsin Avenue
Washington, D.C. 20014

Concerned with providing evaluation, counseling, training, job placement, and other rehabilitation services for the handicapped.

Muscular Dystrophy Association of America
1790 Broadway
New York, NY 10019

Voluntary health agency which fosters research and education on the cause and cure of muscular dystrophy.

National Association for Retarded Citizens
2709 Avenue E. East
Arlington, TX 76011

A national organization of parents, professional workers, and others interested in the mentally retarded. Promotes counseling, treatment, research, public understanding, and legislation for mentally retarded persons.

National Association of the Deaf
814 Thayer Avenue
Silver Spring, MD 20910

A large, national organization of deaf persons which promotes education, fair employment practices, supportive legislation, and employment surveys and job information for the deaf.

Junior National Association of the Deaf
Gallaudet College
Florida Avenue at 7th St. N.E.
Washington, D.C. 20002

Supported by the National Association of the Deaf, this organization of young deaf persons promotes citizenship and opportunities for its members to become self-directed and realize their full human potential.

National Association of the Physically
Handicapped, Inc.
6473 Grandville Avenue
Detroit, Michigan 48228

Association to advance the social, economic, and physical welfare of the handicapped. Members consist of both handicapped and non-handicapped persons.

National Braille Association
85 Godwin Avenue
Midland Park, N.J. 07432

A volunteer organization which produces materials in braille, large type, and tape for the visually handicapped. This organization prepares special vocational materials for blind workers.

National Center for a Barrier Free Environment
7315 Wisconsin Avenue N.W.
Washington, D.C. 20014
Edward H. Noakes, Chairman, Board of Directors

Coalition of major groups active in promoting a barrier-free architectural and transportation environment.

National Committee for Multi-handicapped Children
239 14th Street
Niagara Falls, New York 14303

This group provides information on the educational, therapuetic, recreational, and social service needs of children who have more than one handicap.

National Multiple Sclerosis Society
257 Park Avenue South
New York, N.Y. 10010

Promotes research and public education. Also provides services to persons disabled by multiple sclerosis and helps to establish treatment centers.

National Paraplegia Foundation
333 North Michigan Avenue
Chicago, IL 60601

This organization carries out activities to inform and educate concerned professionals and the general public. Activities include: physical and mental rehabilitation, vocational rehabilitation and placement, and legislation for the handicapped.

Recording for the Blind, Inc.
499 W. Charleston Rd.
Palo Alto, CA

A volunteer-centered organization which supplies free recorded educational material to blind persons.

Registry of Interpreters for the Deaf
P.O. Box 1339
Washington, D.C. 20013

This organization maintains a registry of all interpreters for the deaf in the United States. A directory of interpreters can be obtained from the national office.

Northern California Chapter: Stan Smith, President, 3107 Ida Drive, Concord, CA 94519

Southern California Chapter: Caroline L. Preston, President, 14825 Nordhoff Street, Panorama City, CA 91402

National Tuberculosis and Respiratory Disease Association
1740 Broadway
New York, NY 10019

Federation of state and local associations interested in the prevention and control of lung disease.

United Cerebral Palsy Association, Inc.
66 East 34th Street
New York, NY 10016

Association of groups aiding the cerebral palsied. Supports research, and sponsors professional and public education about cerebral palsy.

Assessment Section

The questions in this section are intended as a check of your general understanding of the instructional considerations involved in teaching handicapped students in regular vocational classes.

The problems which follow are not "formula" questions in which a precise and exact answer is possible. Rather they are meant to stimulate your thinking and cause you to reflect on the content of the module as you write or type your responses on separate sheets of paper.

If you intend sending your responses to a cooperating agency for evaluation, be sure that you

1. Indicate the complete name of the module
2. Number all responses (Questions 1a, 1b, etc.)
3. Enclose your name and return address.

Problem 1.

Various federal programs contain special provisions for providing vocational training to handicapped persons. Briefly describe the purpose and scope of the assistance available through the

a) Vocational Amendments of 1968.

b) Education for All Handicapped Children Act of 1975.

c) Dept. of Rehabilitation.

d) CETA.

Problem 2.

Prevocational assessment is a highly important aspect of designing vocational education to appropriately serve individuals with handicaps. In that regard, discuss

a) the merits and the risks of using commercially available systems of work sample evaluation with handicapped persons (select and name one such system to which your comments apply).

b) a strategy you might use to get an adequate variety of work sample assessments if you decide that the nature of the handicap precludes a fair assessment using the commercial system in your school.

c) other types of information about the student you can use to form some idea of his vocational potential (other than work sample assessment).

Problem 3.

Three of the important activities involved in matching vocational training of handicapped persons to employability are

a) analysis of the job market

b) analysis of the tasks involved in currently available jobs

c) analysis of individual competencies to determine what skills individuals presently have and which they need to acquire.

Describe how each activity might be facilitated by a team approach involving at least the vocational educator, the special educator, and a community representative.

Problem 4.

Evaluation is an essential part of any education program, and it's particularly useful when program modification and improvement is anticipated, resulting in a wider variety of courses available to the handicapped. Explain how information obtained from evaluation of the following activities can help you to better serve the handicapped student in the context of regular vocational training:

a) analysis of which regular vocational courses have been most sought after by persons having different types of handicapping conditions.

b) assessment of newly developed skills, demonstrated to the criterion levels set cooperatively by the instructor and the individual student.

c) follow up study of employment, especially employer and employee satisfaction.

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